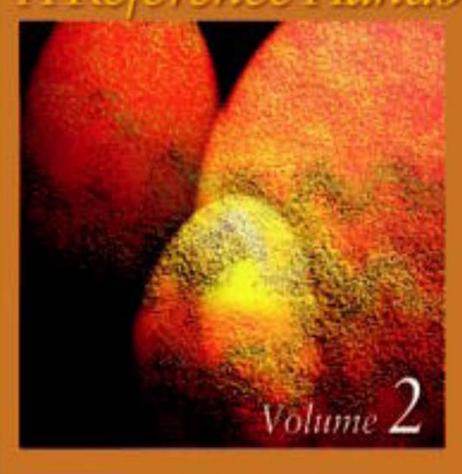
21st Century MANAGEMENT A Reference Handbook



Charles Wankel

21st Century MANAGEMENT A Reference Handbook

21st Century MANAGEMENT A Reference Handbook

2



A SAGE Reference Publication



Copyright © 2008 by SAGE Publications, Inc.

All rights reserved. No part of this book may be reproduced or utilized in any form or by any means, electronic or mechanical, including photocopying, recording, or by any information storage and retrieval system, without permission in writing from the publisher.

For information:



SAGE Publications, Inc. 2455 Teller Road Thousand Oaks, California 91320 E-mail: order@sagepub.com

SAGE Publications Ltd. 1 Oliver's Yard 55 City Road London, EC1Y 1SP United Kingdom

SAGE Publications India Pvt. Ltd. B 1/I 1 Mohan Cooperative Industrial Area Mathura Road, New Delhi 110 044 India

SAGE Publications Asia-Pacific Pte. Ltd. 33 Pekin Street #02-01 Far East Square Singapore 048763

Printed in the United States of America.

Library of Congress Cataloging-in-Publication Data

21st century management : a reference handbook / editor Charles Wankel.

p. cm. — (A Sage reference publication) Includes bibliographical references and index. ISBN 978-1-4129-5633-8 (cloth)

1. Management—Study and teaching. I. Wankel, Charles. II. Title:

Twenty-first century management.

HD30.4.A16 2008 658—dc22

2007031737

This book is printed on acid-free paper.

07 08 09 10 11 10 9 8 7 6 5 4 3 2 1

Publisher: Rolf A. Janke

Acquisitions Editor: Jim Brace-Thompson

Developmental Editor: Sara Tauber Reference Systems Manager: Leticia Gutierrez

Production Editor: Belinda Thresher, Appingo

Cover Designer: Michelle Kenny
Marketing Manager: Amberlyn Erzinger

CONTENTS

VOLUME ONE

Preface About the Editors About the Contributors	xi xvii xix
PART I. ENTREPRENEURSHIP IN THE 21ST CENTURY	
1. Organizational Emergence: Business Start-Up Issues Linda F. Edelman, Bentley College	2
2. Corporate Entrepreneurship Tobias Kollmann and Christoph Stöckmann, University of Duisburg-Essen	11
3. Social Entrepreneurship and Social Enterprise Wolfgang Bielefeld, Indiana University	22
4. High Technology Entrepreneurship Mariann Jelinek, College of William and Mary Claudia Bird Schoonhoven, University of California, Irvine	32
5. Governmental Impedimentation and Facilitation of Entrepreneurship Kathy Fogel, Northern Kentucky University	42
6. Women Entrepreneurs Colette Henry, Dundalk Institute of Technology, Ireland	51
7. Entrepreneurial Resilience: What Makes Entrepreneurs Start Another Business After Failure? Fu-Sheng Tsai, I-Shou University Yueh-Chin Chen, Chao Yang University of Technology	60
8. Strategic Planning in New Ventures and Young SMEs Sascha Kraus, University of Oldenburg	73
PART II. BUSINESS AND SOCIETY: CONTEMPORARY ISSUES	
9. Fostering Social and Civic Responsibility by Organizations and Their People Laurie N. DiPadova-Stocks, Park University	84
10. Poverty Alleviation as a Corporate Issue Rob van Tulder, Erasmus University Ans Kolk, University of Amsterdam	95
11. Organizational Crisis Management in the Post-9/11 Business Epoch Janet L. Rovenpor, Manhattan College	106
12. Integrating Corporate Social Responsibility in the Management of Supply Chains Francesco Ciliberti, Pierpaolo Pontrandolfo, and Barbara Scozzi, Polytechnic of Bari, Italy	116
13. Activist Groups Tactics to Influence Companies Frank G. A. de Bakker and Frank den Hond, Vrije University	127

14.	Global Business Citizenship: A Model of Social Responsibility and Ethical Behavior for the 21st Century Jeanne M. Logsdon, University of New Mexico Donna J. Wood, University of Northern Iowa	138
15.	Excessive Work and Its Business Consequences Gayle Porter, Rutgers University, Camden	148
16.	Factors Influencing Women Managers' Success Claudia Peus, Massachusetts Institute of Technology Eva Traut-Mattausch, University of Munich	157
17.	Future Directions in Labor Relations: A 2025 Perspective James A. Craft, University of Pittsburgh	167
PART	Γ III. MANAGING THE GLOBAL ENTERPRISE	
18.	Global Mind-Set Schon Beechler, Duke Corporate Education Orly Levy, Culture Crossing Consulting Nakiye A. Boyacigiller, Sabanci University Sully Taylor, Portland State University	178
19.	Management in Developing Countries Betty Jane Punnett, University of the West Indies, Cave Hill Campus, Barbados	190
20.	Internationally Managing in the Face of Terrorism-Induced Uncertainty Peter W. Liesch, University of Queensland, Australia John Steen, University of Queensland, Australia Gary A. Knight, Florida State University Michael R. Czinkota, Georgetown University	200
21.	HRM Best Practices and Transfers to the Asia Pacific Region Chris Rowley and Hon-fun Poon, City University, London	209
22.	Cultural Differences in Perceptions of Fairness in Organizational Contexts Uma Janardana Iyer, Austin Peay State University	221
23.	Winning in Asia Peter J. Williamson, INSEAD Singapore	230
24.	Language Issues in Multinational Management Rebecca Piekkari, Helsinki School of Economics	240
PART	Γ IV. SUSTAINABILITY AND THE NATURAL ENVIRONMENT: GREEN MANAGEMENT	
25.	Toward Sustainable Organizations for the 21st Century Ken Peattie, Cardiff University	250
26.	Why Do Firms Comply With Environmental Regulations? Mark A. Cohen, Vanderbilt University	261
27.	Understanding and Overcoming the Green Wall: Environmental Strategy, Leadership, and Change Management in Business Kevin A. Fletcher, Audubon International	271
28.	Environmental Supply Chain Management Joseph Sarkis, Clark University	281
PART	Γ V. STRATEGY IN A FAST AND NETWORKED WORLD	
29.	Strategic Decisions in High-Velocity Contexts Matthias Seifert and Allègre L. Hadida, University of Cambridge	294
30.	Innovation as a Strategy in Network Markets Willow A. Sheremata, York University	303

31.	Planning Effectiveness for Internet-Based Interorganizational Systems Hsiu-Fen Lin, National Taiwan Ocean University Gwo-Guang Lee, National Taiwan University of Science and Technology	313
32.	The Competitive Advantage of Interconnected Firms Dovev Lavie, University of Texas at Austin and Technion	324
33.	New Product and Service Development in Strategic Alliances Donald Gerwin, Carleton University and Erasmus University	335
34.	The Merger Paradox: Determinants and Effects Hans Schenk, Utrecht University	345
35.	Evolving Aspects of Outsourcing to India Rajan A. Thillai, Indian Institute of Technology, Madras	355
36.	Holistic Approaches to Business Planning Elly Philpott, University of Bedfordshire	364
37.	Culture-Sensitive Global Strategies Mikhail V. Grachev, Western Illinois University and University of Iowa Mariya A. Bobina, University of Illinois, Chicago	376
38.	Co-Opetition: Promises and Challenges Devi R. Gnyawali, Virginia Polytechnic Institute and State University Jinyu He, Hong Kong University of Science and Technology Ravindranath Madhavan, University of Pittsburgh	386
39.	Business Imitation Shigeru Asaba, Gakushuin University Marvin B. Lieberman, University of California, Los Angeles	399
PART	TVI. OPERATIONS MANAGEMENT WITH NEW TECHNOLOGIES IN A GLOBAL CONTEXT	
40.	Supply Chain Management: Integration and Globalization in the Age of e-Business <i>M. Eric Johnson and David F. Pyke, Dartmouth College</i>	408
		408 420
41.	M. Eric Johnson and David F. Pyke, Dartmouth College Mass Customization Frank T. Piller, Massachusetts Institute of Technology and	
41. 42.	M. Eric Johnson and David F. Pyke, Dartmouth College Mass Customization Frank T. Piller, Massachusetts Institute of Technology and RWTH Aachen University, Germany Improving Supply-Chain Information Velocity, Product Customization, and Cost Through Extended Enterprise Applications	420
41. 42. 43.	M. Eric Johnson and David F. Pyke, Dartmouth College Mass Customization Frank T. Piller, Massachusetts Institute of Technology and RWTH Aachen University, Germany Improving Supply-Chain Information Velocity, Product Customization, and Cost Through Extended Enterprise Applications T. C. Daniel Loh and Lenny S. C. Koh, University of Sheffield Business Process Outsourcing Management Issues	420
41. 42. 43.	M. Eric Johnson and David F. Pyke, Dartmouth College Mass Customization Frank T. Piller, Massachusetts Institute of Technology and RWTH Aachen University, Germany Improving Supply-Chain Information Velocity, Product Customization, and Cost Through Extended Enterprise Applications T. C. Daniel Loh and Lenny S. C. Koh, University of Sheffield Business Process Outsourcing Management Issues Mohan Thite, Griffith University, Australia Place and Space Strategies for 21st-Century Organizations	420 431 443
41. 42. 43. 44.	M. Eric Johnson and David F. Pyke, Dartmouth College Mass Customization Frank T. Piller, Massachusetts Institute of Technology and RWTH Aachen University, Germany Improving Supply-Chain Information Velocity, Product Customization, and Cost Through Extended Enterprise Applications T. C. Daniel Loh and Lenny S. C. Koh, University of Sheffield Business Process Outsourcing Management Issues Mohan Thite, Griffith University, Australia Place and Space Strategies for 21st-Century Organizations Clive Holtham, City University, London Ethical Manufacturing	420 431 443 451
41. 42. 43. 44. 45.	M. Eric Johnson and David F. Pyke, Dartmouth College Mass Customization Frank T. Piller, Massachusetts Institute of Technology and RWTH Aachen University, Germany Improving Supply-Chain Information Velocity, Product Customization, and Cost Through Extended Enterprise Applications T. C. Daniel Loh and Lenny S. C. Koh, University of Sheffield Business Process Outsourcing Management Issues Mohan Thite, Griffith University, Australia Place and Space Strategies for 21st-Century Organizations Clive Holtham, City University, London Ethical Manufacturing Philippa Collins, Heriot Watt University, Scotland	420 431 443 451
41. 42. 43. 44. 45. PART 46.	M. Eric Johnson and David F. Pyke, Dartmouth College Mass Customization Frank T. Piller, Massachusetts Institute of Technology and RWTH Aachen University, Germany Improving Supply-Chain Information Velocity, Product Customization, and Cost Through Extended Enterprise Applications T. C. Daniel Loh and Lenny S. C. Koh, University of Sheffield Business Process Outsourcing Management Issues Mohan Thite, Griffith University, Australia Place and Space Strategies for 21st-Century Organizations Clive Holtham, City University, London Ethical Manufacturing Philippa Collins, Heriot Watt University, Scotland TVII. ORGANIZING IN THE POST-9/11 WORLD Constraints on Strategy of an Organizational Structure	420 431 443 451 461
41. 42. 43. 44. 45. PART 46. 47.	M. Eric Johnson and David F. Pyke, Dartmouth College Mass Customization Frank T. Piller, Massachusetts Institute of Technology and RWTH Aachen University, Germany Improving Supply-Chain Information Velocity, Product Customization, and Cost Through Extended Enterprise Applications T. C. Daniel Loh and Lenny S. C. Koh, University of Sheffield Business Process Outsourcing Management Issues Mohan Thite, Griffith University, Australia Place and Space Strategies for 21st-Century Organizations Clive Holtham, City University, London Ethical Manufacturing Philippa Collins, Heriot Watt University, Scotland TVII. ORGANIZING IN THE POST-9/11 WORLD Constraints on Strategy of an Organizational Structure Bo Eriksen, University of Southern Denmark Global Projects as New Organizational Form	420 431 443 451 461

Volume Vy q

	ce t the Editors t the Contributors	xi xvii xix
PART	T VIII. TEAMING IN AND BEYOND ORGANIZATIONS IN THE KNOWLEDGE ECONOMY	
50.	The Evolving Nature of Work Teams: Changing to Meet the Requirements of the Future <i>Tjai M. Nielsen, George Washington University</i>	2
51.	Collaborative Innovation: Web-Based Tools for Customer Involvement in New Product Development Gianmario Verona and Emanuela Prandelli, Bocconi University	14
52.	Coordination in Global Teams Mark A. Clark and J. Alberto Espinosa, American University	24
53.	Transnational Teams in Knowledge-Intensive Organizations Martine R. Haas, University of Pennsylvania Mallika Banerjee, Cornell University	34
54.	Conflict Management in Work Teams Helena Syna Desivilya, Max Stern Academic College of Emek Yezreel	44
PAR'	T IX. HUMAN RESOURCES AS A KEY STRATEGIC FACTOR	
55.	Human Resources Management in the 21st Century David Lewin, University of California, Los Angeles	56
56.	Managing in the New Economy: Restructuring White-Collar Work in the United States, the United Kingdom, and Japan John Hassard, Universities of Manchester and Cambridge Leo McCann, University of Manchester Jonathan Morris, Cardiff University	65
57.	Work-Home Interaction: A Challenge to Human Resources Management Eva Cifre and Marisa Salanova, Jaume I University, Spain	76
58.	External Competitiveness: Theoretical and Practical Facets of Strategic Pay Level Decision Making Mark P. Brown, Bradley University	86
59.	Flexible Labor Nicole Torka and Martijn Van Velzen, University of Twente	93
60.	Employee Wellness Programs Adam D. Bailey, Heather L. Shields, and Eric W. Ford, Texas Tech University	103
61.	Career Management Kerr Inkson, University of Waikato, New Zealand	110
62.	Careers in Transition Yehuda Baruch, University of East Angelia	120
63.	The Changing Nature of Mid- and Late Careers	

PART	X. GENDER AND DIVERSITY IN ORGANIZATIONS	
64.	Diversity and Diversity Management in the Age of Globalization Janet L. Kottke and Mark D. Agars, California State University, San Bernardino	140
65.	Ethnic and Minority Enterprise Anuradha Basu, San Jose State University	150
66.	Aging and Work Motivation Ruth Kanfer and Phillip L. Ackerman, Georgia Institute of Technology	160
67.	Family-Friendly Organizations Lizabeth A. Barclay, Oakland University	170
PART	XI. ORGANIZATIONAL BEHAVIOR	
68.	Motivating Individuals and Groups at Work in the 21st Century Naomi Ellemers, Leiden University S. Alexander Haslam, Free University, Amsterdam Dick de Gilder, University of Exeter	182
69.	Intrinsic Motivation in Public Organizations Leonard Bright, University of Louisville	193
70.	Why Self-Set Goals May Sometimes Be Non-Motivating Maika Rawolle, Juergen Glaser, and Hugo M. Kehr, Technical University of Munich	203
71.	Organizational Politics in Management Settings Hunter L. Harris, Vanderbilt University	211
72.	Understanding and Managing Misbehavior in Organizations Ely Weitz and Yoav Vardi, Tel Aviv University	220
73.	Organizational Paranoia: Origins and Dysfunctional Consequences of Exaggerated Distrust and Suspicion in the Workplace *Roderick M. Kramer, Stanford University*	231
74.	New Approaches for Cultivating and Nourishing Communications Networks George B. Graen, University of Illinois, Champaign-Urbana (Emeritus)	239
75.	Intercultural Communication: Strategies for Managing Intercultural Dimensions of Business Hendrick Serrie, Naveen K. Malhotra, Steve Sizoo, and Morris Shapero, Eckerd College	249
76.	Emotion in Organizations Kevin E. Fox and Stephanie E. Granda, Saint Louis University	259
PART	XII. LEADERSHIP WITHOUT BOUNDARIES	
77.	Leadership Style: Developing a Leadership Style to Fit 21st-Century Challenges Dail Fields, Regent University	272
78.	Remote Leadership Elizabeth Kelley, Dalhousie University Kevin Kelloway, St. Mary's University	281
79.	Leadership in Interorganizational Networks Angel Saz-Carranza and Sonia Ospina, New York University Alfred Vernis, ESADE Business School, Barcelona	291
80.	Challenges of Implicit Leadership Theories for Management Birgit Schyns, University of Portsmouth, United Kingdom Jörg Felfe, University of Siegen, Germany	301
81.	Integrating Plurality: Toward an Integral Perspective on Leadership and Organization Wendelin Küpers, University of Hagen, Germany Mark Edwards, University of Western Australia	311
82.	The Global Manager's Work: Crossing Boundaries of Distance, Countries, and Cultures Chris Ernst, Center for Creative Leadership	323

83.	Knowledge Management: Strategy, Culture, Intellectual Capital, and Communities of Inquiry <i>Murray E. Jennex, San Diego State University</i>	336
84.	Facilitating Mobile and Virtual Work Matti A. Vartiainen, Helsinki University of Technology	348
85.	Balancing the Implications of Employee Telework: Understanding the Impacts for Individuals and Organizations Timothy D. Golden, Rensselaer Polytechnic Institute	361
86.	Electronic Monitoring of Personal Web Use at Work Micheal T. Stratton, Hood College	370
87.	Information Privacy in Organizations Bradley J. Alge and S. Duane Hansen, Purdue University	380
88.	Multilingual Issues in Global E-Commerce Web Sites Shaoyi He, California State University, San Marcos	391
89.	Managing Intangible Capital Michael M. Beyerlein, Purdue University Frances A. Kennedy, Clemson University	401
90.	What Is the Business Case for Adopting RFID? Fred Riggins, University of Minnesota	411
PART	XIV. ORGANIZATION DEVELOPMENT AND CHANGE IN THE 21ST CENTURY	
91.	Change Agency in 21st-Century Organizational Life R. Michael Bokeno, Murray State University	424
92.	Organization Development in the 21st-Century Christopher J. Rees, University of Manchester	435
93.	The State of Organization Development David L. Bradford, Stanford University W. Warner Burke, Columbia University	444
94.	Managing Creativity and Innovation in the 21st Century Lisa K. Gundry, DePaul University	450
95.	Organizational Memory: Why Does It Matter? Kim-Chi Wakefield Trinh, National University of Singapore	461
96.	Why Catastrophic Organizational Failures Happen Michael A. Roberto, Bryant University	471
PART	XV. NON-BUSINESS ORGANIZATIONS: NEW PERSPECTIVES	
97.	Arts Management Issues in the 21st Century David Cray, Carleton University, Ottawa, Canada Loretta Inglis, Monash University, Melbourne, Australia	482
98.	Hospital Planning for Weapons of Mass Destruction Incidents Scott Somers and Ronald Perry, Arizona State University	491
99.	Unique Aspects of Managing Sports Organizations Russell Hoye, Matthew Nicholson, and Aaron Smith, La Trobe University, Melbourne, Australia	501
100.	Managing Philanthropic Organizations for Creativity Diana Leat, Center for Civil Society Helmut K. Anheier, University of California, Los Angeles	510
Index		519

PREFACE

1st Century Management provides clear and useful discussion by scholars from around the world of 100 of the key issues and topics that managers are confronting in the 21st century. The structure of discourse for each issue, and important associated perspectives and research, is concisely and meaningfully presented. New technologies, globalization, and associated ethical implications frame many of these issues. The management of 21st century nonprofit, arts, healthcare, sports, and philanthropic organizations are each given chapter length focus. Significant and helpful bibliographic leads for those interested in further researching an issue are provided. This worldwide collaboration includes contributions by leading experts from Australia, Barbados, Canada, Denmark, Finland, France, Germany, India, Ireland, Israel, Italy, Japan, the Netherlands, New Zealand, Singapore, Taiwan, Turkey, the United Kingdom, and the United States.

The first section of this handbook focuses on entrepreneurship in the 21st century. Those entering the labor market today, beyond seeing careers in large enterprises, often find opportunities to join or start new ventures, sometimes even in virtual contexts such as second life. What is important to know about organizational emergence, corporate entrepreneurship, social entrepreneurship, social enterprise, high-technology entrepreneurship, the role of government in helping and impeding entrepreneurs, the special issues that women must address in starting new businesses, how to go about planning new businesses, and why entrepreneurs keep trying after initial failure of a new venture is covered here.

The second topical area to be addressed by this volume concerns contemporary issues of business, society, and government. The 21st century finds businesses nested in over multiple jurisdictions, where cultures and values are changing and that are increasingly beset by crises such as disasters of the natural environment. Global business citizenship is discussed as not only a socially responsible and ethical way for firms to proceed but as a sensible and effective way of fitting with the requirements of the 21st century. New forms of labor relations are evolving given the robust positioning

of competition, both domestic and international, of nonunion and low-wage enterprises. One chapter looks at directions in labor relations with a focus on what they might be in 2025. Excessive work and its business consequences is an issue addressed by a chapter in this book. The factors associated with the success of women managers in business are analyzed. Doing well by doing good is a current business buzz phrase. That is, making money by working with people in poorer nations who benefit by the partnership. This was chiefly sparked by Prahalad's The Fortune at the Bottom of the Pyramid (2006). The multifaceted dimensions of this movement are addressed in a chapter in this section. Another chapter discusses organizational crisis management in the post-9/11 business epoch. The proactive management of an organization's environment including activist groups and other stakeholders is considered at length.

Managing the global enterprise is addressed with a focus on doing business in Asia and developing nations. How firms manage terrorism-induced uncertainty is one of the areas considered. The development of a global mind-set and working in a multilingual business world is covered.

Hurricane Katrina and Al Gore's movie and book put global climate change on the agenda of leaders of business, government, *and* management professors and students, and the reference librarians who guide them. Part IV, Sustainability and the Natural Environment: Green Management, begins with a chapter "Toward Sustainable Organizations for the 21st Century." It is followed by a chapter explaining why firms comply or do not comply with environmental regulations. An applied focus is provided by "Understanding and Overcoming the Green Wall: Environmental Strategy, Leadership, and Change Management in Business." The section concludes with a chapter on how many firms collaboratively incorporate environmentalist concerns in supply chain management.

Strategy in a fast and networked world is the theme of 11 chapters. How strategic decisions are made in highvelocity contexts begins the section. Innovation, effective planning, and competition in Internet-based interorganizational systems are covered by three chapters. Evolving aspects of outsourcing to countries such as India is the focus of another chapter. Business partnerships and mergers are discussed with a focus on interorganizational product and service development and deployment.

Six chapters are on operations management with new technologies in a global context. How companies' boundaries blur in the integrated and globalized context in the age of e-business is one of the focal topics. This is followed by improving supply chain information velocity, product customization, and cost through extended enterprise applications. How information technology and automated processes enable "mass customization" where products can be individualized profitably is the topic of a chapter. Ethical manufacturing is given chapter-length treatment.

Organization and disorganization is examined through the prism of post-9/11 security concerns. One chapter is on hospital planning for weapons of mass destruction incidents. Global projects as an important new organizational form is discussed in a chapter. The constraints of an organization's structure on what it does are also covered.

Teaming in and beyond organizations in the knowledge economy is the focus of five chapters. The section begins with the evolving nature of work teams as they change to meet the requirements of the future. Web-based tools for collaborating with customers to develop new products and services are the subjects of a chapter. Transnational teams in knowledge-intensive organizations are discussed, as is the coordination in global teams and the conflict management within them.

The human resources as a key strategic factor section covers work-home interaction issues, flexibility in work and scheduling, wellness programs, and career management including the special issues associated with mid- and late careers. Diversity and its management in the age of globalization are covered in four chapters. Family friendly organizations are discussed with a focus on the future.

Managing the behavior of people in 21st century organizations is the subject of nine chapters. Motivating people working remotely is discussed. Also covered is making work in public organizations intrinsically motivating. Understanding and managing misbehavior in organizations is a chapter. Intercultural communications and strategies for managing the intercultural dimensions of business are treated in a chapter. Emotion, trust and mistrust, and organizational politics are covered here as well. The part on Organization Development and Change in the 21st Century also has six chapters discussing how change can be most effectively carried out in contemporary organizations.

Leadership is discussed over six chapters. The section begins with a chapter on developing a leadership style to fit 21st century challenges. Then, remote leadership in the new and evolving technological context is explained. Leadership across organizational, functional, cultural, and geographical boundaries is discussed.

The part on Information and Knowledge With Mobility and Ethics includes chapters covering knowledge management, communities of inquiry, facilitating mobile and virtual work, the impact of telework, electronic monitoring of person Web use at work, information privacy organizations, multilingual and multicultural issues in global e-commerce, managing intangible capital, and the implications of radio frequency identification technology.

A new concept for reference books such as this one is a digital form ancillary providing student term paper assignments and course discussion ideas for the topics of the chapters largely shared by chapter authors (for more information, go to www.sagepub.com/wankel). This quasi-instructors' manual provides reference librarians with an overview of the sorts of projects and assignments they might recommend this handbook to facilitate. (Links to the homepages of the chapter authors are accessible at http://management-education.net/h.)

—Charles Wankel

ACKNOWLEDGMENTS

I very appreciatively acknowledge the collegial and valuable content suggestions for the 21st Century Management of the following:

Jeffrey C. Ady University of Hawaii at Manoa

Raj Aggarwal Kent State University

Gib Akin *University of Virginia*

Radwan Ali Kennesaw State University

Ilan Alon Rollins College

Wolfgang Amann IMD

Zvi Aronson Stevens Institute of Technology

Neal M. Ashkanasy University of Queensland

Stephen Ball Lourdes College

Linda Balsamo
University of Phoenix

Kunal Banerji Florida Atlantic University

Boris Bartikowski Euromed Marseille Ecole de Management

Gayle Baugh University of West Florida

Phillip Bereano
University of Washington

Suzanne Bergin-Seers *Victoria University*

Cecile Betit

College of St. Joseph

Allan Bird

University of Missouri

Jim Biteman *Tulane University*

Kim Boal

Texas Tech University

David Boje

New Mexico State University

Peter Bond

Liverpool John Moores University

Lionel Boxer

Royal Melbourne Institute of Technology

Neil Boyd Lycoming College

Ed Breaux

Pittsburg Pioneers

Ethan Burger

Washington College of Law

Timo Busch

Swiss Federal Institute of Technology in Zurich

Stuart Carr Massey University

Frank Cavico

Nova Southeastern University

Sandra Christensen

East Washington University

Harveen Chugh

Imperial College London

Despina Cochliou University of Bath

Boyd Cohen

University of Victoria

Henry Collier

University of Wollongong

Walaa Compton

Kennesaw State University

Harry I. Costin

Group Sup de Co La Rochelle

Madeline Crocitto

SUNY College at Old Westbury

Mark A.G. Darroch

University of KwaZulu-Natal

Patricia Deflorin
St. Gallen University

Lydia Derkach

National Mining University

Mark de Rond

Cambridge University

Robert Desman

Kennesaw State University

Fabio Duarte

Pontifica Universidade Catolica do Parana

Maryse Dubouloy

ESSEC

Gregorio Billikopf Encina *University of California*

Bjørn Ekelund Human Factors AS Eman El Shenawy

Washington State University

Raed Elaydi

University of North Carolina

Robert Flynn

University of Tasmania

Glen Forte

George Washington University

Mike Frandsen *Albion College*

Siegrun Fox Freyss

California State University

Judith A. Gebhardt

University of Southern California

Elissa Giffords

Long Island University

James Gilbreath

Indiana-Purdue University

Christine Goodall Staffordshire University

Paul Gooderham

Norwegian School of Economics and Business Administration

Paul Govekar

Ohio Northern University

Ginger Grant

Simon Frasier University

Terje Gronning

Institute for Educational Research, Oslo

Pierre Guillet de Monthoux Stockholm University

xiv • 21ST CENTURY MANAGEMENT

Edeltraud Günther *University of Virginia*

Mark Hager

University of Texas, San Antonio

Michael M. Harris

University of Missouri-St. Louis

Bill Hefley

Carnegie Mellon University

Meg Hooper

University of Queensland

Arvind K. Jain Concordia University

Vinnie Jauhari

Research Institute for International Management and Technology

C. Douglas Johnson

Georgia Southern University

Hajah Mona Yati Haji Md Kassim University Brunei Darussalam

Hamid H. Kazeroony *University of Phoenix*

Tom Keenoy

University of London

Franz Will Kellermanns Mississippi State University

Travis Kemp

University of South Australia

Thomas W. Kent College of Charleston

James King

University of Alabama

Mike Kiska

Jefferson County (Colorado) Public Library

Olga Kuznetsova

Manchester Metropolitan University

Peter Langford

Macquarie University

Ryan L. Lanham Virginia Tech

Suzan Langenberg
Estonian Business School

Edward Leach

Dalhousie University

Mark Learmonth
Nottingham University

Beverly Leeds

University of Central Lancashire

Stephen Leybourne *University of Plymouth*

Canchu Lin

Bowling Green State University

Dirk Lindebaum

University of Manchester

Hong Liu

Manchester Business School

William Low

University of Auckland

John Hassard

Manchester Business School

Scott A. Hipsher Bangkok University

Seung-Hyun Lee *University of Texas*

Joel Lefkowitz

Baruch College, CUNY

Valeria Leite

Federal University of Itajuba

Laurence S. Lyons

Chris MacDonald

Henley Management College

Saint Mary's University

Lauchlan Mackinnon

University of Queensland
Alice Macpherson
Kwantlen University

Judi Marshall
University of Bath

Mark Matheson

Raymond James Financial Services, Inc.

Anita M. McGahan *Boston University*

Drummond McNaughton
Touro University International

Paul Miesing

University of New York at Albany

Graham Mole

Manchester Metropolitan University

Erik Monsen

Max Planck Institute of Economics

Sanford Moskowitz

College of St. Benedict/St. Johns University

Karen Moustafa

Indiana-Purdue University

Bahaudin G. Mujtaba

Nova Southeastern University

J. Mark Munoz Millikin University

Bahaudin Mujtaba

Nova Southeastern University

Lori Muse

Western Michigan University

Martti Muukkonen University of Joensuu

Nick Nissley Banff Center

Loretta O'Donnell *Macquarie University*

Özlem Öz

Bogazici University

David Ozag

Habitat for Humanity

Banu Ozkazanc Pan

University of Massachusetts

Jacob Park

Green Mountain College

Fay Cobb Payton

North Carolina State University

Kathie Pelletier

Claremont Graduate University

James Peoples

University of Wisconsin-Milwaukee

Richard Peters

Florida Atlantic University

Donde Plowman

University of Texas at San Antonio

Richard A. Posthuma *University of Texas*

Vana R. Prewitt

University of North Carolina

Anat Rafaeli

Israel Institute of Technology

Pat Raskin

Columbia University

Maike Rathje

St. Gallen University

Emmanuel Raufflet HEC Montreal

Erwin Rausch Kean College

Alf Rehn

Royal Institute of Technology

Gene Remoff
Lycoming College
Elena Revilla
Instituto de Empresa

Sally Riad

Victoria University of Wellington

Alex Rialp

Autonomous University of Barcelona

Rosa Nelly Treviño Rodríguez *University of Navarra*

Elisabeth Rossen *University of Oslo*

Carol Royal

University of New South Wales

Sonja Sackmann
University of Munich

Lichia Saner-Yiu

Centre for Socio-Eco-Nomic Development

Janet Sayers

Massey University

Augusto Schianchi

University of Parma

Lyle Schoenfeldt

Appalachian State University

William D. Schulte, Jr.

Shenandoah University Winchester

Sandor Schuman

University of New York at Albany

Michael Schwartz

Royal Melbourne Institute of Technology

May Seitanidi

University of Nottingham

Selwyn Seymour Edinburgh University

Radha Sharma

Management Development Institute

Sanjay Sharma

Wilfrid Laurier University

Manish Singhal Xavier University

xvi • 21ST CENTURY MANAGEMENT

Julie Smendzuik-O'Brien Fielding Graduate University

Jaye Smith

Pepperdine University

Robert Smith

The Robert Gordon University

Roderick Smith

Aberdeen Business School

William Smith
Towson University
Ebrahim Soltani

University of Kent
Paul E. Spector

University of South Florida

Roy Stager Jacques

Auckland University of Technology

Ron Stone

DeVry University

Adam Sulkowski

University of Massachusetts

Sherry Sullivan

Bowling Green State University

Michael Sweig Roosevelt University

William Tankersley University of West Florida

Rana Tassabehji University of Bradford

Don Tepas

University of Connecticut

Siri Terjesen

Queensland University of Technology

Jane Terpstra-Tong *University of Macau*

John Thornton

University of South Australia

Len Tischler

University of Scranton

Raymond Trau Deakin University

W. Trexler Proffitt Jr.

Franklin and Marshall College

William Tullar

University of North Carolina Greensboro

Nicholas W. Twigg

McNeese State University

James Underwood

Dallas Baptist University

Harry J. Van Buren III

University of New Mexico

Rita van der Vorst Imperial College London

Deborah Vidaver-Cohen

Florida International University

Madhu Viswanathan University of Illinois

Isabell Welpe

Ludwig Maximilians University, Munich

Pierre Winkler

Hogeschool van Amsterdam

Patricia D. Witherspoon University of Texas at El Paso

Monika Winn *University of Victoria*

Paul Wong

Trinity Western University

Larry Wright

Washington State Mentoring Partnership

Alan Zaremba

Northeastern University

ABOUT THE EDITORS

EDITOR IN CHIEF

Charles Wankel, PhD, is Associate Professor of Management at St. John's University, New York. He received his doctorate from New York University. Wankel has authored and edited many books including the bestselling Management, 3rd edition (1986), Rethinking Management Education for the 21st Century (2002), Educating Managers with Tomorrow's Technologies (2003), The Cutting-Edge of International Management Education (2004), Educating Managers Through Real World Projects (2005), New Visions of Graduate Management Education (2006), the Handbook of 21st Century Management (2008), and Being and Becoming a Management Education Scholar (2008). He is the leading founder and director of scholarly virtual communities for management professors, currently directing eight with thousands of participants in more than 70 nations. He has taught in Lithuania at the Kaunas University of Technology (Fulbright Fellowship) and the University of Vilnius (United Nations Development Program and Soros Foundation funding). Invited lectures include 2005 Distinguished Speaker at the Education without Border Conference, Abu Dhabi and 2004 Keynote speaker at the Nippon Academy of Management, Tokyo. Corporate management development program development clients include McDonald's Corporation's Hamburger University and IBM Learning Services. Pro bono consulting assignments include reengineering and total quality management programs for the Lithuanian National Postal Service.

MANAGING EDITORS

Charnsmorn "Lily" Hwang is a doctoral student at Rutgers University. She received her bachelor's degree from William Patterson University, where she is currently conducting field research. She was involved in the editorial process (with Charles Wankel) on several other books including University and Corporate Innovations in Lifetime Learning, Being and Becoming a Management Education Scholar, Innovative Approaches to Increasing Global Sustainability, Management Education for Global Sustain-

ability, Alleviating Poverty through Business Strategy, and Innovative Approaches to Reducing Global Poverty.

Matthew G. Marovich, BA and MA, Rutgers University, has held research and editorial associate positions on several of Charles Wankel's book projects including New Visions of Graduate Management Education, Alleviating Poverty through Business Strategy, and The Cutting Edge of International Management Education. His entrepreneurial experience includes district management and licensed principal for the Primerica Financial Services division of CitiGroup. He is currently preparing to undertake an interdisciplinary doctoral program in entrepreneurship.

ASSOCIATE EDITORS

Joseph E. Champoux is a Regents' Professor of Management at the University of New Mexico. He received his PhD in Administration from the University of California, Irvine in 1974. Champoux has served as a visiting professor in France, Mexico, Brazil, The Netherlands, and Austria. He teaches graduate and undergraduate courses in organizational theory and organization behavior. His current research activities focus on film as a teaching resource and enhancements for online courses, Champoux has authored or coauthored 30 journal articles, 11 book chapters, and 30 print or electronic books.

David Lewin, PhD, is the Neil Jacoby Professor of Management, Human Resources, and Organizational Behavior at the UCLA Anderson School of Management where he is also Senior Associate Dean for the MBA program. A specialist in human resource management and employment relations, Lewin has published 19 books and more than 150 articles. Among his recent books are *International Perspectives and Challenges in Human Resource Management, Human Resource Management: An Economic Approach, The Human Resource Management Handbook, Contemporary Issues in Employment Relations, and Advances in Industrial and Labor Relations, Volume 15. He is presently writing two new books: One is titled Conflict Management in the Modern Corporation, and the other*

xviii • 21ST CENTURY MANAGEMENT

is titled *The Dual Theory of Human Resources and Business Performance*. Prior to joining UCLA in 1990, he was professor, director of the PhD Program, director of the Human Resources Research Center, and director of the Senior Executive Program at the Columbia University Graduate School of Business.

Jeanne M. Logsdon, PhD, is Regents Professor and Jack and Donna Rust Professor of Business Ethics at the Anderson School of Management, University of New Mexico. Her research focuses on many topics related to corporate social performance. Logsdon coauthored *Global Business Citizenship: A Transformative Framework for Ethics and Sustainable Capitalism.*

Paul Shrivastava, the Howard I. Scott Chair and Professor of Management at Bucknell University, received his PhD

from the University of Pittsburgh, and has published 15 books and over 100 articles in professional journals. He has served on the editorial boards of leading management education journals including the Academy of Management Review, the Strategic Management Journal, Organization, Risk Management, and Business Strategy and the Environment. He won a Fulbright Senior Scholar Award. He helped found Hindustan Computer Ltd., one of India's largest computer companies and the non-profit Industrial Crisis Institute, Inc. in New York. He published the Industrial Crisis Quarterly, founded Organization and Environment (published by Sage Publications), and founded and was President and CEO of eSocrates, Inc., a knowledge management software company. He was previously a tenured Associate Professor of Management at the Stern School of Business, New York University.

ABOUT THE CONTRIBUTORS

Phillip L. Ackerman is Professor of Psychology at the Georgia Institute of Technology, Atlanta, Georgia. He has coedited three books and published over 100 articles and chapters on topics of abilities, personality, learning, and aging. He is a Fellow of APA, APS, and the Human Factors and Ergonomics Society.

Mark D. Agars is an Associate Professor of Psychology at California State University, San Bernardino. Some of his research and writing interests include gender issues in the workplace, diversity management, and the work-family interface. Mark earned his PhD in Industrial/Organizational Psychology in 1999 from Pennsylvania State University.

Antti Ainamo is Professor at University of Turku's Institutions and Social Mechanisms. His publications include articles in Organization Science, Research in the Sociology of Organizations, Human Relations, Journal of Eastern Management Studies and Business Strategy Review, as well as a book published by Kluwer/Springer. His current research interests include such new and strategic forms of organization as networks and projects, as well as design and fashion.

Bradley J. Alge, PhD, is an Associate Professor of Management at the Krannert School at Purdue University. He teaches courses in organizational behavior and human resource management in Krannert's executive, MBA, and MSHRM programs. Professor Alge is also an accomplished researcher conducting research on leadership, motivation, team dynamics, prosocial and antisocial work behaviors, information privacy, creativity, and technology.

Helmut K. Anheier, PhD (Yale University, 1986), is Professor of Public Policy and Social Welfare at UCLA, where he directs the Center for Civil Society, and the Center for Globalization and Policy Research. He is also Centennial Professor at the London School of Economics. Before embarking on an academic career, Anheier served as Social Affairs Officer at the United Nations. He is author of over 250 publications, including over 30 authored and edited books. He has won several national and international awards including the 2006 PNP Best Book Award of the American Academy of Management. He is currently researching the role of philanthropy internationally and is interested in

methodological questions at the intersection of globalization, civil society, and culture. Anheier serves on the board of several scholarly and philanthropic organizations.

Shigeru Asaba is a Professor of Management at Gakushuin University, Tokyo, Japan. He received his PhD in management from UCLA. His current research interests are empirical analyses on competition and collaboration among Japanese firms, on the impacts of foreign entry into Japanese markets, and on diversification and downsizing behavior of Japanese firms.

Robert D. Austin, Associate Professor at Harvard Business School, is faculty chair of an Executive Education program for Chief Information Officers and teaches Managing in the Creative Economy in the MBA program. His research focuses on knowledge-intensive work; he has authored, coauthored, or coedited several books, most recently *The Broadband Explosion: Leading Thinkers on the Promise of a Truly Interactive World* (with S. Bradley). He also has written numerous articles in academic and practitioner journals. His industry experience includes work as an executive for a business incubated by a leading technology company and as a manager at Ford Motor Company.

Adam D. Bailey is a PhD student in the department of management at Texas Tech University. Adam's research interest includes business and government relations, and the interdependency of business strategies and government policies. Bailey earned a BS in Political Science and an MBA in Business Administration from Boise State University.

Mallika Banerjee is reading for a PhD degree at the School of Industrial and Labor Relations, Cornell University. She earned her first BSc in Economics from Calcutta University (India), second BA in Sociology with commendations from the University of Exeter (United Kingdom) and her master's from the University of Cambridge. In years following, she worked as a financial consultant in London. Her wider specialization is in the field of organizational studies and international human resource management. She specifically works on contingent work and patterns of business ownership among high-skilled immigrant self-employed groups in the United States.

Lizabeth A. Barclay is Professor of Management at Oakland University. She is an Industrial/Organizational Psychologist by training, receiving her PhD from Wayne State University in Detroit. Her research interests include self-efficacy, educational assessment, and diversity issues at work. She has published in journals such as the *Journal of Applied Psychology, Academy of Management Review, Journal of Collective Negotiations, HR Magazine, Public Management, Public Personnel Management, Journal of Occupational and Organizational Psychology, and the <i>Journal of Teaching International Business.* She is also certified as a Senior Professional of Human Resources (SPHR).

Yehuda Baruch is Professor of Management at UEA Norwich, United Kingdom, held visiting positions at the University of Texas at Arlington, and London Business School. He published extensively in the areas of global and strategic HRM, careers, and technology management. He is the editor of *Group & Organization Management* and former Chair, Careers Division, Academy of Management.

Anuradha Basu is Director, Silicon Valley Center for Entrepreneurship and Associate Professor, Department of Organization & Management, San Jose State University. She previously taught at Reading University Business School, United Kingdom. She has a PhD in Economics from the University of Cambridge, United Kingdom and an MBA from IIM Calcutta, India.

Schon Beechler is Professor, Department of Organization & Management, College of Business, San Jose State University, and Director, Silicon Valley Center for Entrepreneurship. She previously taught at Reading University Business School, United Kingdom, and held a visiting position at Stanford University. She is co-editor of the Oxford Handbook of Entrepreneurship (OUP, 2006). She has a PhD from the University of Cambridge, United Kingdom, an MBA from the Indian Institute of Management, Calcutta, and a BA (Honours) in Economics from St. Stephen's College, University of Delhi, India.

Heather L. Bemis-Shields is currently a doctoral student in management at Texas Tech University, focusing on issues of strategic human resource management. She has over a dozen years of experience as a human resources director for large Fortune 500 companies, and she is nationally SPHR certified by the Society for Human Resource Management.

Michael M. Beyerlein is Department Head and Professor in the department of Organizational Leadership and Supervision, College of Technology, Purdue University. His research interests include all aspects of collaborative work systems, organization transformation, creativity/innovation, and the learning organization. He has published in a number of journals and has been a member of several editorial

boards. He has authored or edited 18 books. His most recent books include *Guiding the Journey to Collaborative Work Systems* (2004) and *Collaborative Capital* (2005). His field projects have involved such companies as Boeing, AMD, Shell, Intel, NCH, and Raytheon.

Wolfgang Bielefeld is Professor of Public and Environmental Affairs; Adjunct Professor at the Center on Philanthropy; Affiliate Faculty, Center for Urban Policy and the Environment; and Adjunct Professor of Sociology at Indiana University, Purdue University, Indianapolis. His interests include the relations between nonprofit organizations and their environments, the dynamics of nonprofit sectors, the development of human service delivery systems, and the social impacts of government human service policies and spending patterns. Current research includes the extent and consequences of the distribution of nonprofits over metropolitan areas and organizational, economic, and political dynamics in local human service delivery systems.

Mariya Bobina is PhD Candidate (Business Administration) at the University of Illinois at Chicago. She received doctoral degree from the Russian Academy of Sciences. Her professional interests include economic and managerial aspects of corporate combinations in the global economy, notably strategic alliances. She published a book and scholarly articles in *Journal for International Business Studies, Thunderbird International Business Review, International Journal of Leadership Studies, Venture Capital,* and *Voprosi Ekonomiki*. Her business competencies are based on practical experience as top financial officer in the Russian aircraft industry and as consultant to a number of Russian and international companies in energy sector.

R. Michael Bokeno is associate professor of Organizational Communication, in the College of Business and Public Affairs at Murray State University, Murray, Kentucky, where he teaches graduate courses in organizational discourse, development, and change. He is on the editorial board of the Journal of Organizational Change Management and The Journal of Business and Public Affairs, and he is a reviewer for Management Communication Quarterly and other international organization and management journals. His theoretical interests lie at the intersection of critical organization studies, organizational learning, and complexity science, and is specifically focused on the alternative forms of human interaction implied by these. His applied interests eventuate in The Clio Endeavor, a research and development agency focused on interventions for systemic change via dialogic interaction, alternative forms of mentoring, and authentic stakeholder participation.

Nakiye A. Boyacigiller is Dean of the Faculty of Management at Sabanci University in Istanbul, Turkey (www. sabanciuniv.edu). Nakiye spent her early career teaching and researching cross-cultural management at San Jose State. In addition to her edited book *Crossing Cultures: Insights*

from Master Teachers (with R. Goodman and M. Phillips), she has published in numerous journals and research compendiums. Boyacigiller has held leadership positions in both the Academy of Management and the Academy of International Business and sits on six editorial boards. She was educated at the University of California, Berkeley (PhD), University of California, Los Angeles (MBA), and Bogazici University (BA).

David L. Bradford is the Eugene O'Kelly II Emeritus Senior Lecturer in Leadership and Dean of the Executive Program on Leadership and Power at the Graduate School of Business, Stanford University. He earned his PhD in Social Psychology from the University of Michigan. In addition to numerous articles, he has coauthored five books on leadership and change and has consulted numerous organizations in the private and public sector.

Leonard Bright is currently an Assistant Professor in the Department of Urban and Public Affairs at the University of Louisville. He received his PhD from Portland State University in 2003. His research interest focuses on management and leadership issues in public organizations. He has published in journals such as *Journal of Public Affairs Education*, *Public Personnel Management*, and the *Review of Public Personnel Administration*.

Mark Brown is an associate professor of management at Bradley University in Peoria, Illinois. Dr. Brown received his PhD and MBA from Louisiana State University and his BA in economics from the University of the South in Sewanee, Tennessee. His research interests include strategic compensation issues, the performance effects of human resource practices in hospitals, and international management.

W. Warner Burke is Edward L. Thorndike Professor of Psychology and Education in the Department of Organization and Leadership at Teachers College, Columbia University. He has authored over 130 articles and book chapters and authored or edited 14 books. He is past editor of Organizational Dynamics and the Academy Management Executive.

Yueh-Chin Chen is assistant professor of strategy and new venture creation at the School of Business, Chao-Yang University of Technology of Taiwan. She received her PhD in Business Administration from the School of Business, National Central University, Taiwan in January 2006. Her research interests include entrepreneurial studies and new venture strategy. She has published papers in several conference and journals.

Eva Cifre is Associate Professor of Human Resources Psychology at Jaume I University (Spain). She has a PhD in Work & Organizational Psychology and her research interests are mainly focused on effects of technology at work (including telework), psychosocial health promotion

at work (psychosocial well-being, flow at work, etc.), and work/home interaction strategies. She is also involved on work risk-prevention consultancy.

Francesco Ciliberti is Assistant Professor with a 3-year contract at the Polytechnic of Bari, Italy, where he carries out his research at the Department of Environmental Engineering and Sustainable Development. He has a PhD in Advanced Production Systems and is author of more than 20 papers. His research is mainly focused on corporate social responsibility and supply chain management.

Mark A. Clark is an associate professor at the Kogod School of Business, American University, in Washington DC. He earned his PhD at Arizona State University. His research centers on managing broadly-defined diversity in team contexts, including the effect of differences in knowledge, culture, and demographics on individual decisions and team performance. His work has been published in *Academy of Management Journal*, *Journal of Applied Psychology*, *Group Dynamics*, and other outlets.

Mark A. Cohen is the Justin Potter Professor of American Competitive Enterprise at the Owen Graduate School of Management, Vanderbilt University, and Codirector of the Vanderbilt Center for Environmental Management Studies (VCEMS). He previously served as staff economist at the U.S. Environmental Protection Agency, Federal Trade Commission, and Sentencing Commission. Professor Cohen has extensive experience analyzing government enforcement policies with particular emphasis on environmental and criminal justice issues. He has published numerous studies on topics such as why firms comply and/or overcomply with environmental regulations and government enforcement policy and judicial sentencing of individuals and firms convicted of corporate crimes.

Philippa Collins (PhD) has been privileged to experience many different employment and research opportunities, resulting in a holistic view of business and a "hybrid" approach to research. Her experience lies in the implementation of change management, with particular focus on the analysis of process management and the impact of new information technologies on business and management. After studying for her PhD at Cranfield University, she has continued to focus on management research, with special reference to CSR and ethics in operations management. Currently a Senior Lecturer at Heriot Watt University, Scotland, Collins is a regular speaker at conferences and seminars. As well as many articles, she has published *Virtual and Networked Organizations* (2002).

James A. Craft is Professor of Business Administration at the University of Pittsburgh. He holds a PhD in Organizational Behavior and Industrial Relations from the University of California, Berkeley and has held faculty positions at Berkeley, Purdue University, and Pittsburgh. He has served as a consultant to a variety of organizations

and has lectured on human resources topics throughout Latin America and Europe. He has been a Bookings Fellow and labor force analyst with the U.S. Department of Labor and has worked for the Machinists union. His research and teaching focus on labor management relations and strategic human resources management.

David Cray is an associate professor in the Sprott School of Business at Carleton University, Ottawa, Canada. He has co-authored two books as well as articles in journals including the Journal of International Business Studies, British Journal of Management and Organization Studies.

Michael R. Czinkota serves on the faculties of Georgetown University's McDonough School of Business in Washington D.C. and of Birmingham University's business school in the United Kingdom. A former Deputy Assistant Secretary of Commerce he advises the Executive Office of the President, the U.S. Congress, and the WTO. His current research focuses on the effects of terrorism on international marketing, trade policy, global market entry, and export development strategies. He is the coauthor of two leading text books, *International Marketing*, 8th edition and *International Business*, 7th edition. He serves on the board of governors of the Academy of Marketing Science and on a number of editorial boards.

Frank G. A. de Bakker is an assistant professor of strategic management in the Faculty of Social Sciences, Vrije Universiteit, Amsterdam. His research at present focuses on the intersection of neo-institutional organization theory, stakeholder management and social movement theory, specifically concerning interactions between NGOs and firms. He coedited *Managing Corporate Social Responsibility in Action: Talking, Doing and Measuring* (2007) and a special issue of *Business & Society* on "The Politics of Stakeholder Influence" (2008). He published in the *Academy of Management Review, Business & Society, Journal of Industrial Ecology, Business Strategy and the Environment*, and other journals.

Dick de Gilder (PhD, Groningen 1991), University of Amsterdam (1992–2001), currently is an associate professor at Vrije Universiteit, Amsterdam, Department of Public Administration and Organization Science. His research interests involve intra- and intergroup relations and their effects on organizational behavior, social networks in organizations, error management, and management of research groups.

Frank den Hond is an Associate Professor in the Faculty of Social Sciences, Vrije Universiteit, Amsterdam. He coedited *Pesticides, Problems, Improvements, Alternatives* (2003) and *Managing Corporate Social Responsibility in Action: Talking, Doing and Measuring* (2007), as well as a special issue of *Business & Society* (2008) on "The Politics of Stakeholder Influence." His current research interests are at the intersection of neo-institutional organization theory

and social movement theory, focusing on the interaction between NGOs and firms. He published in the *Academy of Management Review*, *Business & Society*, *Journal of Corporate Citizenship*, *Organization Studies*, *Research Policy*, and other journals.

Helena Syna Desivilya (PhD, SUNY at Buffalo), a social organizational psychologist by training, she is head of sociology and anthropology department at the Max Stern Academic College of Emek Yezreel. She conducts research on intergroup conflict and conflict in organizations, notably in work teams and publishes her work in conflict and organizational journals. At the applied arena, she has conducted training workshops on conflict management and mediation for educators, community workers, labor union representatives, mental health professionals, and educators in former Yugoslavia. She also engages in evaluation research of social and educational programs, action research, and building partnerships. She is an active member of the International Association for Conflict Management.

Lee Devin taught theatre at the University of Virginia (1962–1966), Vassar College (1966–1970), and Swarthmore College (1970–2002). In 1975, he became a member of the artistic staff of the People's Light and Theatre, acting, teaching acting, and doing dramaturgy. With Rob Austin of the Harvard Business School, he wrote *Artful Making; What Managers Need to Know about How Artists Work* published in 2003. In 2005, it won LMDA's Elliott Hayes Award for dramaturgy. He is Senior Dramaturg at People's Light and Theatre and at work on writing projects.

Laurie N. DiPadova-Stocks (PhD, SUNY-Albany, 1995) Professor and Dean, Hauptmann School for Public Affairs, Park University, is a proponent for the moral responsibility of higher education in a democratic society. She served as founding director of the Scripps Howard Center for Civic Engagement at Northern Kentucky University and Deputy Director of the Center for Public Policy and Administration at the University of Utah. Her work has appeared in Human Resource Management Journal, Journal of Public Affairs Education, Academy of Management Learning and Education, International Journal of Case Research and Application, Journal of Management History, and American Sociologist.

Linda F. Edelman is an Associate Professor of Strategic Management and Bentley College. Previously, she was a Research Fellow at the Warwick Business School in Coventry, United Kingdom, and is currently a member of the ikon (innovation, knowledge, organizational networks) research team. She received her MBA and her DBA from Boston University. She is the author of 6 book chapters and over 25 scholarly articles. Her current research examines the resources, cognitive strategies, and networks of new ventures as well as the innovation and learning strategies of project groups and teams. Her work has appeared in *Journal of Business Venturing; Academy of Management Learning*

and Education, Journal of Small Business Management; Organization Studies; Management Learning, and British Journal of Management.

Mark Edwards is a psychologist and is currently completing a PhD at the Business School, University of Western Australia. His thesis involves the development of an integral approach to organizational transformation. He has worked with people with disabilities for 20 years in such roles as consultant psychologist, program coordinator, and development officer.

Naomi Ellemers, PhD (Groningen, 1991), Free University Amsterdam (1991–1999), currently is a full professor Leiden University (1999–Present). She has published extensively on group processes and intergroup relations, and their effects on social behavior in organizations. She has (co)edited a number of books on social identity and stereotyping.

Bo Eriksen is an Associate Professor in the Department of Marketing and Management at the University of Southern Denmark. He received his PhD from Odense University (1997) and his master's degree from Copenhagen Business School (1990). His research lies in the intersection of strategy and organization. He is the cofounder of KnowledgeLab.dk, a center promoting technology transfer from the business and humanities to the private sector, and his most recent experiences have included technology transfer to the private sector that resulted in two commercial spinoffs and numerous cooperative projects. Currently, he is focusing on building his research agenda within strategy and organization.

Chris Ernst is currently Research Director for the Center for Creative Leadership, Asia. His work centers on advancing leadership across boundaries in a diverse and interconnected world. As a researcher, he writes and presents frequently on international issues and is coauthor of the book *Success for the New Global Manager: How to Work Across Distance, Countries and Cultures.* As a practitioner, he has served in expatriate roles in Asia and Europe, manages and leads multicultural teams, and creates leadership modules and tools for client organizations worldwide. Ernst holds a PhD in Industrial and Organizational Psychology from North Carolina State University.

J. Alberto Espinosa is an Assistant Professor of Information Technology and UPS Scholar at the Kogod School of Business at American University in Washington, DC. He received his PhD in Information Systems from the Tepper School of Business at Carnegie Mellon University. His research focuses on understanding how teams coordinate across global boundaries and studying which team processes and information technologies are most effective in bridging these boundaries to help teams achieve high levels of performance. His current research focus is on global software and technical teams, team knowledge, team co-

ordination, and spatial and temporal boundaries. His work has been published in leading academic journals, including Management Science, Organization Science, The Journal of Management Information Systems, and Communications of the Association for Computer Machinery.

Jörg Felfe received his PhD at the Free University Berlin, Germany. Now he is a professor for social and organizational psychology at the University of Siegen. He conducts research on transformational leadership, the perception of leadership, and organizational commitment in different cultures. At the applied field, he has conducted leadership trainings, coaching for executives, surveys, and selection in different areas. He is also engaged in evaluation research of educational programs.

Dail Fields, PhD (Georgia Institute of Technology, 1994), serves as a professor in the Regent University PhD program in Organizational Leadership. In 2007 he was a Fulbright scholar at Lithuania Christian College in Klaipeda, Lithuania. He is also editor of the *International Journal of Leadership Studies*. Fields is the author of *Taking the Measure of Work*, He has published research studies in the *Academy of Management Journal, Journal of Management, Group and Organization Studies, Journal of Occupational and Organizational Psychology*, and the *International Journal of Human Resource Management*. Fields served on the faculties of George Washington University and the City University of Hong Kong and held senior positions with Deloitte-Touche and MCI.

Kevin A. Fletcher is Executive Director for Audubon International, a nonprofit environmental education organization. Prior to this, he was an Instructor at Rensselaer Polytechnic Institute (RPI), Managing Editor for the *Corporate Environmental Strategy Journal*, and Vice President of an environmental management consulting firm. He has a BS in biology from SUNY at Geneseo, as well as an MS in environmental management and a PhD in management from RPI.

Kathy Fogel, PhD (University of Alberta), is Assistant Professor of Finance at Northern Kentucky University. Her research focuses on corporate governance systems around the world and the interactions between firms' (established or entrepreneurial) economic behaviors and the external institutional environment including government policies, capital market development, and legal environment.

Eric W. Ford is the Rawls Professor of Healthcare Organization Management and the Director of the Center for Health Care Innovation, Education and Research at Texas Tech University. Ford's research interests include health care information systems and how they are used to improve patient safety and control costs. He is currently working on two federal grants to study Regional Health Information Organizations and a third studying nationwide patient-safety initiatives. Ford is a graduate of Cornell University and

earned his PhD in Administration from the University of Alabama at Birmingham.

Kevin E. Fox is an Assistant Professor in Industrial/ Organizational Psychology at Saint Louis University. He earned his PhD at the University of Tulsa. His research is in the area of emotion and personality. His research has been published in *Personality and Social Psychology Bulletin* and *Journal of Occupational Health Psychology*.

Donald Gerwin is an Emeritus Professor at Carleton University in Ottawa, Canada and a Visiting Professor at the Department of Management of Technology and Innovation, Rotterdam School of Management, Erasmus University. He lives in Paris. At Carleton, he held a research chair in technology management and headed the Research Program in Managing Technological Change. He is coauthor of Management of Advanced Manufacturing Technology: Strategy, Organization and Innovation and has published in numerous scholarly and professional journals. He has also held editorial positions with a number of scholarly journals. He has been invited to research institutes in Austria, France, Germany, and Norway. His research interests are in managing new product development within and between firms.

Juergen Glaser is tenured assistant professor at the Chair of Psychology, Technical University Munich (TUM Business School). He received his habilitation and PhD in psychology from the University of Munich and the Technical University Munich. His current research interests are occupational health, stress and burnout, interaction work, and creativity.

Devi Ram Gnyawali, PhD (University of Pittsburgh), is an Associate Professor at the Pamplin College of Business, Virginia Polytechnic Institute and State University (Virginia Tech). His research interests include dynamics of interfirm collaboration and competition, role of internal and collaboration-based knowledge and capabilities on firm innovation, and knowledge flows in multinational corporations.

Timothy Golden, PhD, is an Assistant Professor of Management in the Lally School of Management and Technology at Rensselaer Polytechnic Institute (RPI). His current research interests include telework and other forms of virtual work, work-family conflict, dispersed leadership, and managerial ethics. His research has appeared recently in a number of journals, including the *Academy of Management Executive*, *Journal of Management*, *Journal of Organizational Behavior*, *Journal of Applied Psychology*, *Journal of Vocational Behavior*, and others.

Robert I. Goler, Director of the Graduate Arts Management Program at American University (Washington, DC), has been a Fellow in Museum Practice at the Smithsonian Institution and Research Fellow at The Winterthur Museum and codirected the Performing Arts Research Coalition for Washington, DC. He has worked at several museums including the Chicago Historical Society and the National Museum

of Health and Medicine, and he was on the faculty of The New School for Social Research. His articles have appeared in numerous journals including the *Journal of Arts Management, Law and Society, Journal of Museum Management and Curatorship*, and *Journal for Nonprofit Management*.

Mikhail Grachev is Professor at Western Illinois University and University of Iowa. His professional expertise is multinational organizations' strategies, cross-cultural management, and international human resource management. He served as university faculty in the United States, Russia, France, Hungary, Czech Republic, and Japan, and he was named Wharton Senior Research Scholar. Mikhail Grachev contributed to various cross-national educational programs and taught in executive education programs. He is the author of several books and articles in top-tier academic journals.

George B. Graen, a working class, native Minneapolitan received his PhD at the University of Minnesota in 1967 and was a Research Professor at several universities, Illinois, Champaign-Urbana, Minnesota, Cincinnati, Louisiana, Science and Technology of Hong Kong, Chinese University of Hong Kong, Donghau in China and Nagoya, and Keio in Japan. Graen, father of LMX leadership theory, has been actively researching communications for 40 years. He currently edits with Joan A. Graen, his wife of 48 years, *LMX Leadership: The Series* designed to stimulate more penetrating research in organizational leadership communications.

Stephanie E. Granda is a doctoral student in Industrial/Organizational Psychology at Saint Louis University. She is a consultant at Colarelli, Meyer, and Associates, a St. Louis-based management consulting company. Her research interests are in the area of work affect, job attitudes, and employee retention.

Lisa K. Gundry is Professor of Management in the Kellstadt Graduate School of Business and Director of the Center for Creativity and Innovation at DePaul University. She teaches Creativity in Business and Entrepreneurship Strategy, and her research focuses on creativity and innovation strategies and processes in organizations.

Martine R. Haas is an associate professor of management at the Wharton School of the University of Pennsylvania. She received her PhD from Harvard University. Professor Haas has worked as a management consultant for McKinsey and Company in London, and for the international development agency Oxfam. Her research explores how knowledge is utilized within and across complex organizations and the implications for important performance outcomes. She has published articles in academic journals including Administrative Science Quarterly, Management Science, Organization Science, and Strategic Management Journal.

Allègre L. Hadida is an Assistant Professor at Judge Business School and a Fellow of Magdalene College in Cambridge, UK. Her research interests include the Resource-Based View, New Institutional Economics, and arts management. She is a Visiting Professor at HEC, Paris, and was on research leave at MIT Sloan School of Management in 2007.

S. Duane Hansen is a PhD student at the Krannert School of Management, Purdue University. He earned his MBA, Beta Gamma Sigma, at Willamette University. He has conducted research or managed technology-related projects for several large organizations and is currently pursuing research interests in organizational monitoring, trust, and leadership.

Hunter L. Harris is currently researching organizational politics within management settings and hopes that this stream of research will help further understanding and ultimately alleviate the epidemic of malicious workplace politics. He founded the Center for Advanced Research in Organizational Politics. Hunter has completed a number of consulting engagements in organizational effectiveness and business process engineering roles including Honeywell International, United Technologies Corp, GlaxoSmith-Kline Pharmaceuticals, USAA, and Agilent Technologies. His education includes BS (Marketing) from Oklahoma State University, MBA from Wake Forest University, MILR (Strategic HRM) from Cornell University, and is currently pursuing his PhD (Management) from Vanderbilt University.

S. Alexander Haslam is Professor of Social and Organizational Psychology at the University of Exeter. A former Chief Editor of the *European Journal of Social Psychology*, in 2005, he received a Kurt Lewin award for outstanding contribution to research in social psychology from the European Association of Experimental Social Psychology. His most recent books are *Psychology in Organizations: The Social Identity Approach* (2nd ed. 2004) and *Social Identity at Work: Developing Theory for Organizational Practice* (with van Knippenberg, Platow, & Ellemers 2003). In 2006, he was made a Fellow of the Canadian Institute of Advanced Research.

John Hassard is Professor of Organizational Analysis at Manchester Business School (University of Manchester) and Senior Professorial Research Associate at the Judge Business School, University of Cambridge. Previously, he taught and researched at the London Business School and Universities of Cardiff and Keele. His main research interests lie in theories of organization, critical management studies, and the empirical analysis of industrial change, especially in relation to transitional economies. On these subjects, he has published 12 books and more than 100 research articles. Hassard is currently a board member of the Society for the Advancement of Management Studies.

Jinyu He is an Assistant Professor at the Department of Management of Organization of the Hong Kong University

of Science and Technology. He received his PhD in Strategic Management from the University of Illinois at Urbana-Champaign. His primary research interests are corporate governance and firm-level competitive behavior.

Shaoyi He, Associate Professor of Information Systems, California State University San Marcos. He received his PhD from the University of North Carolina at Chapel Hill in 1998. His current research interests include interplay of technology, culture, and language in global e-business; multilingual information access and retrieval on the Web; multilingual issues in e-commerce Web site glocalization; and language barriers in marketing across cultures. He has published papers in such academic journals as Journal of the American Society for Information Science, Information Processing and Management, Journal of Information Communication and Library Science, Electronic Library, and Journal of China Society for Scientific and Technical Information. He is a member of the Association of Computing Machinery, Association for Information Systems, and American Society for Information Science and Technology.

Colette Henry is Head of Department of Business Studies at Dundalk Institute of Technology and Director of the Institute's Centre for Entrepreneurship Research. Her research interests include entrepreneurship education and training, program design and evaluation, enterprise policy and effectiveness, female entrepreneurship, and the creative industries. She is author of Entrepreneurship Education and Training, coeditor of Female Entrepreneurship: Implications For education, Training and Policy published in September 2006, and editor of Entrepreneurship in the Creative Industries—A Global Perspective. She also edits the Ernst & Young Entrepreneur of the Year Case Series and the INTRE—Irish Cases in Entrepreneurship (Volume 2).

Clive Holtham, after taking a master's degree in management, trained as an accountant and was Young Accountant of the Year in 1976. Following 6 years as a Director of Finance and IT, he moved to the Business School in 1988. His research is into the strategic exploitation of information systems, knowledge management, and management learning. He has been an adviser to the European Parliament on educational multimedia. In 2003, he was awarded a UK National Teaching Fellowship. He is author of a large number of publications, lectures, broadcasts, and consults in the United Kingdom and internationally.

Russell Hoye, PhD, is an Associate Professor in Sport Management in the School of Sport, Tourism and Hospitality Management at La Trobe University, Australia. His research and teaching interests focus on the governance and management of sport organizations and the fields of organizational theory and public policy. His most recent books include *Sport Governance* (2007), and *Working with Volunteers in Sport: Theory and Practice* (2006). He is the Series Editor for the *Sport Management Series*

Loretta Inglis is a lecturer in the Department of Management, Monash University, Melbourne, Australia. She has published in the area of nonprofit organizations, leadership and arts management..

Kerr Inkson, PhD (University of Waikato, New Zealand), is an Adjunct Professor of Management at the University of Waikato, New Zealand. He has published over 60 refereed journal articles (including articles in Administrative Science Quarterly, Journal of Applied Psychology, Journal of Management Studies, Human Relations, Journal of Organizational Behavior, and Journal of Vocational Behavior), over 30 book chapters, and 12 books including The New Careers (with M. B. Arthur & J. K. Pringle 1999), Cultural Intelligence (with D. C. Thomas 2004), and Understanding Careers: The Metaphors of Working Lives (2007). He is a former Chair of the Careers Division, Academy of Management.

Uma Janardana Iyer is an Associate Professor and coordinator for Industrial/Organizational Psychology program at Austin Peay State University. She received her PhD from the Indian Institute of Technology, India and previously taught at the psychology department at University at Albany. Iyer has presented her research work at numerous professional and international conferences and has several publications in peer-reviewed journals in management and psychology. Iyer has won teaching excellence award and was an invited delegate at the Oxford Round Table, United Kingdom. Her research interests include performance evaluation, achievement motivation, job attitudes and behavior, diversity, and cross-cultural issues at workplace.

Mariann Jelinek, PhD, is the Richard C. Kraemer Chair of Strategy at the Mason School of Business at the College of William and Mary in Williamsburg, Virginia, and visiting Research Professor at the Technical University of Eindhoven, the Netherlands. Her research centers on innovation, technology and organizations, and high-technology firms and mature industries.

Murray E. Jennex, PhD, PE, CISSP is an Associate Professor at San Diego State University, Editor in Chief of the *International Journal of Knowledge Management*, President of the Foundation for Knowledge Management (LLC), and the HICSS Knowledge Management Systems Track cochair. He is the author of over 100 journal articles, book chapters, and conference proceedings.

M. Eric Johnson is Director of Tuck's Glassmeyer/McNamee Center for Digital Strategies and Professor of Operations Management at the Tuck School of Business, Dartmouth College. His teaching and research focuses on the impact of information technology on supply chain management. His research articles have appeared in such academic journals as Management Science, Operations Research, IEEE Transactions on Engineering Management, Production and Operations Management, Manufacturing and Ser-

vice Operations Management, and Transportation Science. He holds PhD in engineering from Stanford University.

Ruth Kanfer is Professor of Psychology at Georgia Institute of Technology, Atlanta, Georgia. She is a Fellow of APA, SIOP, and APS and past representative on the AoM Board of Governors. Her research interests include the role of personality and motivation in skill training, job performance, job search, and workforce aging. Recent awards for her work include SIOP's Distinguished Scientific Contributions Award, and the Williams Owens Scholarly Achievement Award.

Hugo M. Kehr is holding the Chair of Psychology at the Technical University Munich. A Heisenberg Fellow of the German Research Foundation and a von Humboldt Fellow, Kehr received his habilitation and his PhD in psychology from the University of Munich. His research interests include work motivation, volition, self-management, and leadership.

Elizabeth Kelley is a member of the Faculty of Management, Dalhousie University, Halifax, Nova Scotia. She received her PhD in Management from Saint Mary's University, Halifax. Her research explores the role of context in leadership theory and practice and her dissertation (2005) focused on leadership in a virtual environment.

E. Kevin Kelloway is Professor of Management and Psychology at Saint Mary's University and Senior Research Fellow at the CN Centre for Occupational Health and Safety, Halifax. Kelloway's research interests include occupational health psychology, leadership, the development and measurement of work attitudes/values, unionization, and the management of knowledge workers.

Frances A. Kennedy is an Associate Professor at Clemson University teaching management accounting. Kennedy also has 13 years of experience in public accounting and in industry. She worked as accounting manager in a manufacturing facility and as an analyst on a new product development team. Kennedy's research focuses on performance measurements and control systems in lean enterprises. She is the 2006 recipient of the Silver Lybrand Medal awarded by the Institute of Management Accounting and the 2006 Award of Merit from the International Federation of Accountants for her contributions to the field of management accounting.

Gary A. Knight is Associate Professor and Director of International Business Programs at Florida State University. His research focus is international business strategy, bornglobal firms, and the effect of terrorism on international firms. He has written over 90 articles published in academic journals and conference proceedings. He serves on the editorial review boards of the *Journal of International Business Studies, Journal of International Marketing,* and *Journal of International Entrepreneurship.* He obtained a MBA from the University of Washington and a PhD from Michigan State University, and he was an executive in industry prior to joining academia.

S. C. Lenny Koh, PhD, is Director of Logistics and Supply Chain Management Research Group, Full Professor in Operations Management, at the University of Sheffield Management School United Kingdom. She holds a Doctorate in Operations Management and a first-class honors degree in Industrial and Manufacturing Systems Engineering. Her research interests include ERP/ERPII, uncertainty management, modern operations management practices, logistics and supply chain management, e-business, e-organizations, knowledge management, sustainable business, and ecologistics. She has over 185 publications and is in the Marquis Premier Edition of *Who's Who of Emerging Leaders*. She is editor of several journals and chairperson of international conferences.

Ans Kolk is Full Professor at the University of Amsterdam Business School, the Netherlands. She is also director of the research institute. Her areas of research, teaching, and publications are in corporate social responsibility and environmental management, especially in relation to the strategy and management of international business firms and international policy. Professor Kolk has published in a range of international journals such as Journal of International Business Studies, Harvard Business Review, Management International Review, California Management Review, Journal of World Business, World Development, Journal of Business Ethics, Business and Society, European Management Journal, Business Strategy and the Environment, and Business and Politics.

Tobias Kollmann is a Professor of Business Administration at the University of Duisburg-Essen, Germany. He received his doctorate in 1997 with a thesis on the acceptance of innovative telecommunication and multimedia systems. From 2001, he was the chair of e-business at the University of Kiel, Germany, teaching at the Multimedia Campus Kiel. Since 2005, he is the chair of e-business and e-entrepreneurship at the University of Duisburg-Essen, where he focuses particularly on questions of business venturing and business development in the field of the net economy.

Janet L. Kottke is a Professor of Psychology at California State University, San Bernardino and founder of the Master of Science program in Industrial and Organizational Psychology offered at CSUSB. Her research interests include workplace diversity, measurement of individual and group outcomes, and graduate education planning and programming.

Roderick M. Kramer is the William R. Kimball Professor of Organizational Behavior at the Stanford Business School. He is the author or coauthor of more than 100 scholarly articles. His work has appeared in leading academic journals, as well as popular journals. He is the coauthor of numerous books, including Negotiation in Social Contexts, Trust in Organizations, Power and Influence in Organizations, and Trust and Distrust Within Organizations. He has been on the editorial boards of numerous leading academic journals including Administrative Science Quarterly and Organizations.

tion Science. He lives in Stanford, California with his wife and children.

Sascha Kraus is Assistant Professor at the University of Oldenburg and member of the board of the Institute of Management Research Cologne (Germany). He lectures Entrepreneurship and Innovation Management at the University of Klagenfurt and the Vienna University of Economics and Business Administration (Austria). Kraus holds a doctorate from the University of Klagenfurt as well as several master's degrees from universities from Germany, The Netherlands, and Australia. He has further been founder of a new business venture in the media branch and board member of two German SMEs. His main research areas are Strategic Management and Entrepreneurship.

Wendelin M. Küpers, Senior Lecturer and Senior Researcher, Department of Business Administration, Leadership, and Organization at the University in Hagen, Germany, and is also teaching at Universities of St. Gallen and Innsbruck. He received PhDs from the University of Witten/Herdecke, Germany and Ruhr University. From March 2008 he will be affiliated with Massey University, New Zealand. His published research focuses on integral leadership as well as on the emotional and aesthetic dimensions and issues of knowledge and learning in and of organizations. He is developing an integral "pheno-practice," the practical relevance of phenomenology for questions related to integral ways of organizing and managing.

Dovev Lavie is an Assistant Professor at the University of Texas at Austin. He received his PhD in Management from the Wharton School at the University of Pennsylvania. Lavie is a Sloan Industry Studies Fellow, a winner of the Academy of Management William H. Newman Award, a recipient of the Academy of Management BPS Distinguished Paper Award, a recipient of the INFORMS TMS Best Dissertation Award, and also a Landau Fellow, currently serving as a senior lecturer at the Technion. Focusing on strategic management, Lavie's research interests include value creation and appropriation in alliance networks, relational capabilities and performance implications of alliances, and applications of the resource-based view in interconnected technology-intensive industries. His work has been published in the Academy of Management Review, Academy of Management Journal, and the Strategic Management Journal among other outlets.

Gwo-Guang Lee is a professor in the Department of Information Management at National Taiwan University of Science and Technology (NTUST), Taipei, Taiwan. He received a PhD from the School of Computer Studies at the University of Leeds, UK, in 1993. His current research interests focus on organizational behavior, knowledge management, and IS strategic planning.

Orly Levy is a consultant based in Tel Aviv, Israel. In her research and consulting practice, she specializes in leading and managing cultural change in multinational corpora-

tions, managerial global mind-set development, and crosscultural team effectiveness. Her research publications have appeared in the *Journal of International Business Studies, Journal of Organizational Behavior, The International Journal of Human Resource Management*, and *Advances in International Management*. She received her PhD in sociology from the University of Wisconsin-Madison.

David Lewin, PhD, is the Neil Jacoby Professor of Management, Human Resources, and Organizational Behavior at UCLA, where he is Senior Associate Dean for the MBA program. He has published 19 books and more than 150 articles. His recent books include International Perspectives and Challenges in Human Resource Management, Human Resource Management: An Economic Approach, The Human Resource Management Handbook, Advances in Industrial and Labor Relations. He is senior editor of Advances in Industrial and Labor Relations, and a member of the editorial boards of Industrial Relations, Industrial and Labor Relations Review, and California Management Review.

Marvin Lieberman, PhD (Business Economics, Harvard University), is Professor of Policy at the UCLA Anderson School of Management. His teaching and research interests are in the areas of competitive strategy, industrial economics, and operations management. He has published articles on various business topics including market entry and exit, first mover advantages, cost reduction and productivity improvement, and strategic investment.

Peter W. Liesch is Chair of the Enterprise and International Business Cluster at The University of Queensland Business School. He has published widely in academic journals, including the Journal of International Business Studies, Journal of Operations Management, Journal of World Business, Journal of Business Research, Journal of Management Studies, Management International Review, and others. He is a Professional Member of the Economic Society of Australia, and a Fellow of the Australian Institute of Management. He serves on the Standing Committee of University of Queensland's Academic Board. His research interests include internationalization of the firm, alternative systems of exchange, and international business operations.

Hsiu-Fen Lin is an assistant professor in the Department of Shipping and Transportation Management, National Taiwan Ocean University. She holds a PhD in Information Management from National Taiwan University of Science and Technology. Her research interests include electronic commerce, knowledge management, and organizational impact of information technology.

Jeanne M. Logsdon, PhD, is a Regents Professor and holds the Jack and Donna Rust Professorship of Business Ethics at the Anderson Schools of Management, University of New Mexico. Her current research focuses on many topics related to corporate social performance, including global business citizenship, business ethics, shareholder activism,

environmental problems and remedies, and collaboration between the private, nonprofit, and public sectors. Logsdon coauthored with three colleagues *Global Business Citizenship: A Transformative Framework for Ethics and Sustainable Capitalism*, published by M.E. Sharpe in 2006. She has served as the editor of *Business & Society* and co-edited the *Proceedings* of the International Association for Business and Society annual meetings in 2005, 2006, and 2007. She was presented with the Sumner Marcus Award for Outstanding Service by the Social Issues in Management Division of the Academy of Management in 2007.

T. C. Daniel Loh, PhD, is a member of Logistics and Supply Chain Management Research Group and a University Tutor at the University of Sheffield Management School United Kingdom. He holds a Doctorate in Operations Management and a first-class honors degree in Industrial and Manufacturing Systems Engineering. His research interests include Supply Chain Management, ERP/ERPII, Uncertainty Management, Knowledge Management, Elogistics and the use of Radio Frequency Identification in warehouse management. He has over 3 years commercial experience in electronic company and over 10 research publications both national and international.

Ravindranath "Ravi" Madhavan, PhD (University of Pittsburgh), is an Associate Professor of Business Administration at the Joseph M. Katz Graduate School of Business, University of Pittsburgh. His research seeks to understand the interaction structure of competitive advantage as it applies to corporate strategy and to the dynamics of globalization.

Naveen K. Malhotra is Professor of International Business and Finance at Eckerd College. He holds BA, MBA, and PhD degrees from University of Delhi, University of Tampa, and University of South Florida. He has published widely on the issues of Lifelong Learning and International Business. As the Sam M. Walton Free Enterprise Fellow at Eckerd College, he directs the highly successful service-learning chapter of Students in Free Enterprise. His teams have repeatedly won regional and national championship awards and have been recognized for their efforts by the City Council and the Mayor of St. Petersburg, Florida.

Leo McCann, PhD, is Lecturer in International and Comparative Management at Manchester Business School. He is primarily interested in the sociology of work and employment, especially in transitional economies (particularly Russia and China) and the advanced economies of the United Kingdom, the United States, and Japan.

Jonathan Morris is Professor of Organizational Analysis and HRM Section Head at Cardiff University's Business School. His research interests are in management and organization in East Asia and management and new organizational forms and currently, a large ESRC-funded project critically evaluating the management of the UK Labour government's modernization agenda.

Matthew Nicholson, PhD, is a Senior Lecturer in Sport Management in the School of Sport, Tourism and Hospitality Management at La Trobe University, Melbourne, Australia. His research and teaching interests focus on the relationship between sport and the media, the contribution of sport to social capital, and sport policy development and practice. His most recent books include *Sport and the Media: Managing the Nexus* (2007), Sport Management: Principles and Applications (2006), and Australian Sport: Better by Design? The Evolution of Australian Sport Policy (2004).

Tjai M. Nielsen is an Assistant Professor in the School of Business at The George Washington University (GWSB). Nielsen teaches in GWSB's MBA and doctoral programs. He has authored more than 20 research articles and book chapters on work teams and executive development. Recently, Nielsen received a Best Reviewer Award from the Academy of Management. He currently serves on the editorial boards of the *Journal of Organizational Behavior* and *Group & Organization Management*. Prior to joining GWSB, Nielsen worked as a consultant for RHR International Company. In this role, he worked with a variety of organizations in North America, Europe, and the Middle East.

Sonia Ospina is Associate Professor of Public Management and Policy and Faculty Director of the Research Center for Leadership in Action at New York University's Robert F. Wagner Graduate School of Public Service. Her work is grounded on institutional analysis and organizational theory and spans both the United States and Latin America. Her research explores how responsibility is negotiated and distributed among stakeholders participating in collective problem solving in society and in organizations and its impact on democracy. Ospina currently directs a Ford Foundation sponsored multiyear, national research project on social change leadership in the United States and participates in a comparative study of public management evaluation systems in thirteen countries in Latin America. She has authored numerous articles and books, among them, Illusions of Opportunity: Employee Expectations and Work Place Inequality (Cornell University Press, 2006). Ospina earned her PhD in Sociology and a master's in Public Policy and Management from the State University of New York at Stony Brook.

Ken Peattie is Professor of Marketing Strategy at Cardiff Business School, which he joined in 1986, after spending time working in marketing practice in the international paper and electronics industries. He is also Director of the ESRC Research Centre for Business Relationships, Accountability, Sustainability, and Society (BRASS), which specializes in research into corporate sustainability and social responsibility. His research focuses on the implications that sustainability has for the marketing and corporate strategies of business, and for marketing and management research and education. He has authored two books and numerous book chapters and refereed journal articles on these issues.

Ronald W. Perry is Professor of Public Affairs at Arizona State University. His principal research interests are in disaster preparedness, public hazard education, and disaster operations. Perry currently serves on the Steering Committees for the Phoenix Urban Area Security Initiative, the Phoenix Metropolitan Medical Response System, and the Arizona Council for Earthquake Safety. He holds the Award for Excellence in Emergency Management from the Arizona Emergency Services Association and the Award for Outstanding Environmental Achievement from the U.S. Environmental Protection Agency. The Phoenix Fire Department selected him for the Pearce Memorial Award for Contributions to Hazardous Incident Management.

Claudia Peus is Assistant Professor of Social/Organizational Psychology at Ludwig Maximilian University Munich (Germany) and a Visiting Scholar at MIT's Sloan School of Management. Her research interests include the impact of leadership on follower attitudes and behaviors, leadership development, and women in management. In addition to her academic work, she is involved in executive education programs for managers of commercial as well as non-profit organizations.

Elly Philpott is a Senior Research Fellow at the University of Bedfordshire, a visiting lecturer at the University of Hertfordshire and a private business consultant. She has a BSc in Physical Science, a Master's in IT for Manufacture, and a PhD in Concurrent Engineering and design ethos. She has worked in international supply chain management in the telecommunications sector and with various aerospace and automotive OEMs to improve new product introduction processes. More recently, She has been engaged in the support of local SMEs.

Rebecca Piekkari is Professor of International Business at the Helsinki School of Economics, Finland. Her area of expertise is international management, with a specific focus on management of global corporations. She has also written about the use of qualitative research methods in international business. Her articles have appeared in the *Journal of Management Studies, European Management Journal, International Journal of Cross-Cultural Management, International Business Review, Management International Review, Corporate Communications*, and Business Communication Quarterly. Her most recent book is the Handbook of Qualitative Research Methods for International Business (with C. Welch) published by Edward Elgar in 2004.

Frank T. Piller is a Professor of Management at RWTH Aachen University, Germany, and the director of its innovation management group. He also holds a research affiliation with the MIT Design Lab at the Massachusetts Institute of Technology in Cambridge, Massachusetts. He graduated summa cum laude with a PhD in operations management from the University of Wuerzburg, Germany, and worked as an assistant/associate professor at TUM Business School (Munich, Germany) from 1999 to 2004. Before joining

Aachen University, he held a research fellowship at MIT Sloan School of Management from late 2004 until 2007. Piller's research focuses on user cocreation, mass customization, and the management of discontinuous innovation.

Pierpaolo Pontrandolfo is Full Professor in Business and Management Engineering at the Polytechnic of Bari, Italy, where he is Head of Department of Environmental Engineering and Sustainable Development. He holds a PhD in Advanced Production Systems. He was visiting scholar at the University of South Florida, USA, in 1995 and 1997. He is author of about 80 papers, 40 of which are published by international books or journals. His research mainly concerns supply chain management.

Irene Hon-fun Poon has been a consultant within the human capital group of Watson Wyatt for many years. Poon took a degree in BA followed by an MBA at Hong Kong University of Science and Technology. She is currently a PhD candidate of Cass Business School, City University of London. She holds professional qualifications of GRP and CCP of World at Work, United States and is a Licentiate of Chartered Institute of Personnel and Development, United Kingdom. Her research interests include cross-cultural management and Asia Pacific management and business. Her recent publications are in the *Asia Pacific Business Review*.

Gayle Porter is a member of the Management Faculty at Rutgers University in Camden, New Jersey. Her industry experience includes technical work in the oil and gas industry, finance and accounting with a Fortune 500 company, and consulting on training programs and employee development. Gayle received her PhD in Management and Human Resource from The Ohio State University. At Rutgers, she teaches courses in Organizational Change, Social Responsibility, International Human Resource Management, and Performance Improvement/Employee Development. Porter's research explores various organizational supports for realization of employees' full potential. Her publications focus on workaholism and work ethic, and issues surrounding collaborative work.

Emanuela Prandelli is an Associate Professor of Management at Bocconi University. She holds a PhD in Management and served as a Research Assistant at the Kellogg School of Management, Northwestern University (1998–1999) and as a Visiting Professor in 2001. Her research focus regards virtual communities of consumption, the study of e-business, and the process of innovation. She published several international articles in leading international journals like CMR, JIM, OS, and MIT Sloan Management Review. She won the 2001 Accenture Award for the best paper published in California Management Review in 2000.

Betty Jane Punnett, Professor of International Business and Management at the Cave Hill Campus of the University of the West Indies. She came to Cave Hill in 1999, from the Mona Campus. Punnett holds a PhD in Interna-

tional Business from New York University, an MBA from Marist College and a BA from McGill University. She has published over 50 academic papers. Recent books include The Handbook for International Management Research, International Perspectives on Organizational Behavior and Human Resource Management, Experiencing International Business and Management, and Successful Professional Women of the Americas.

David F. Pyke is the Kimball Professor of the Science of Administration and Associate Dean at the Tuck School of Business, Dartmouth College. His research interests include supply chain management, pricing, inventory, and low-cost country sourcing. He has consulted for Accenture, Corning, DHL, Eaton, and Black & Decker among others.

Maika Rawolle is academic associate and PhD candidate at the Chair of Psychology, Technical University of Munich. She has an Honors Degree in Psychology from the University of Potsdam. Her research interests focus on motivation diagnostics, work motivation, visions, and volition.

Christopher J. Rees, PhD, is a chartered psychologist based within the Institute for Development Policy and Management at the University of Manchester, United Kingdom. He holds an honorary Chair in International Human Resources at Beijing University of Technology. His professional interests focus upon international HR-related change and development initiatives.

Fred Riggins is an Assistant Professor at the Carlson School of Management of the University of Minnesota. He received his PhD from Carnegie Mellon University and has served as a faculty member at Georgia Tech and the University of Alberta. His research focuses on strategies for implementing interorganizational systems such as RFID, new business models for Internet-based commerce, and the implications of the digital divide for managers and businesses. He is the RFID Project Leader at the MIS Research Center at the Carlson School where he organizes and hosts a quarterly RFID Industry Forum.

Michael Roberto, Trustee Professor of Management at Bryant University. He previously taught at Harvard Business School and New York University. Roberto's research focuses on strategic decision-making processes and senior management teams. He has published articles based upon his research in the Harvard Business Review, California Management Review, MIT Sloan Management Review, The Leadership Quarterly, Group and Organization Management, and Ivey Business Journal. His recent book Why Great Leaders Don't Take Yes For An Answer was named one of the top 10 business books of 2005 by The Globe and Mail, Canada's largest daily newspaper.

Janet Linda Rovenpor is a Professor of Management at Manhattan College, Riverdale, New York. She teaches courses in Introduction to Management, Human Behavior in Organizations, Strategic Management, and E-Manage-

ment. The author of numerous articles in academic and professional journals, Rovenpor's research and writing have focused on business ethics, managerial values and personality traits, women in management, and organizational crises. She has written case studies on JetBlue Airways, Abercrombie & Fitch, The Corcoran Group, The Alyeska Pipeline Service Company, and Eli Lilly & Company.

Chris Rowley, PhD (Oxford), Professor of Human Resource Management, Cass Business School, City University, is Director of the *Centre for Research on Asian Management*, Editor of *Asia Pacific Business Review*, Series Editor of "Studies in Asia Pacific Business" and "Asian Studies: Contemporary Issues and Trends," and has published widely including in *California Management Review, Journal of World Business*, and *International Journal of HRM*, with over 100 articles, 80 book chapters, and 20 books. New and forthcoming include *The Practice of HRM in Asia*, *The Changing Face of Management in Korea*, *The Changing Face of Asian Women in Management*, *Asian Industrial Relations: An Enterprise Case Book*, *Trends in Mobile Technology & Business in Asia*, and *HRM: The Key Concepts*.

Marisa Salanova is Full Professor of Work Psychology at Jaume I University (Spain). She has a PhD in Work & Organizational Psychology and published about 100 articles, book chapters, and books on effects of technology at work, training, job stress, burnout, and engagement. She is also involved on organizational consultancy particularly about job stress interventions in organizations.

Joseph Sarkis is a Professor of Operations and Environmental Management within the Graduate School of Management at Clark University. He earned his PhD from the University of Buffalo. He has published over 200 articles as peer reviewed journal articles, published proceedings, and book chapters. His research interests include business and the environment, logistics, supply chain, information systems, technology and operations management topics. He recently published an edited book titled *Greening the Supply Chain*. He is a member of a number of editorial boards for a wide range of internationally recognized journals. Currently, he is the editor of *Management Research News*, published by Emerald Publishers. He is also a member of a number of professional organizations.

Angel Saz-Carranza is completing a PhD in Public Management at ESADE and is a Visiting Scholar at the Wagner School of Public Service, NYU. He has worked with nonprofits and governmental institutions in Europe, Africa, Latin America, and Asia in Humanitarian Aid and International Development and in the European Commission's Humanitarian Office, and has been the Sudan Country Coordinator with CESVI-World Aid from Italy, and Vice-President of Engineers Without Borders-Catalunya.

Hans Schenk is Professor of Economics and Director of the Tjalling C. Koopmans Research Institute at Utrecht

University's School of Economics (USE) in the Netherlands. He is an active consultant to businesses and governments and an associate editor of the *International Journal of the Economics of Business* and the *International Review of Applied Economics*.

Claudia Bird Schoonhoven (Kaye) is Professor of Organization and Strategy at the Paul Merage School of Business, University of California Irvine, and she earned degrees at Stanford University (PhD, MA). Schoonhoven's research focuses on the evolutionary dynamics of technology-based firms, innovation, and entrepreneurship. She is coauthor of The Innovation Marathon: Lessons from High Technology Firms (1990, 1993), The Entrepreneurship Dynamic in Industry Evolution (2001), and her research has been published in the ASQ, AMJ, OS, JABS, and other journals and books. The Technology and Innovation Management Division of the Academy of Management recently honored her as their Distinguished Scholar for 2006. Schoonhoven is a Fellow of the Academy of Management, the former Editor in Chief of Organization Science, and former President of the Western Academy of Management.

Birgit Schyns received her PhD at the University of Leipzig, Germany. She worked as an Assistant Professor in the Netherlands where she continued her work on leadership, preparedness to change, and self-efficacy. Her research focuses on leadership, especially the perception of leadership and implicit leadership theories. She is currently a reader at the Portsmouth Business School, United Kingdom.

Barbara Scozzi is Assistant Professor in Business and Management Engineering at the Polytechnic of Bari, Italy. She got the PhD in Business Engineering at University of Tor Vergata/Rome Polytechnic of Bari (Italy) in 2001. Her main research interests are coordination, knowledge management, and innovation in business organizations.

Matthias Seifert is a PhD candidate at Judge Business School, University of Cambridge. His research focuses on intuition and rationality in organizational decision capabilities and is funded by the Economic and Social Research Council, United Kingdom. He holds degrees in Decision Sciences, Economics, and Management from LSE and the University of Hamburg.

James Sena is Professor of Management and Information Systems at Cal Poly's Orfalea College of Business. His current teaching assignments include Organization Systems and Technology, Management Information Systems, Project Management, Business and IT Strategy, and Computer Security. He received his PhD in Organization Theory and Computer Science from the University of Kentucky. His research interests include knowledge management; sustainable work systems; process analysis and reengineering; research and development of group decision making; and organizational analysis.

Hendrick Serrie is Professor Emeritus of Anthropology and International Business at Eckerd College. He holds degrees from the University of Wisconsin, Cornell University, and Northwestern University. Since 1980, he has been a pioneer in the practical applications of cultural anthropology to international business, and has specialized in cross-cultural communication and behavior, multicultural management and organization development, corporate culture, and Third World technology transfer and product development. He was the Founding Chairman of a unique anthropology-led major in International Business that for over 2 decades has been among Eckerd College's three most popular programs.

Morris Shapero is Assistant Professor of International Business at Eckerd College. He holds BS and MBA degrees from the University of Southern California. He came to Eckerd College in 2002, after nearly 30 years working in corporate marketing and management both domestically and internationally. For many years, he was Principal of Morris Alan Marketing, a marketing consulting service in St. Petersburg, Florida. His teaching and research interests focus on international management and intercultural communications.

Willow A. Sheremata is an Associate Professor of Business Policy at York University. She received her PhD from the Stern School of Business at New York University. Her research interests include the benefits to firms—and society—of competing through radical innovation and corresponding difficulties in the implementation process. She continues to address tensions that arise from the simultaneous need for knowledge generation and integration in the innovation process, as well as the role of power. Her strategy formulation work addresses the effects of innovation type on competitive dynamics and innovation performance. She has published in the Academy of Management Review, the Journal of Product Innovation Management, and the Antitrust Bulletin.

Kenneth S. Shultz is a Professor of Psychology at California State University, San Bernardino. He received his PhD in industrial-organizational psychology from Wayne State University. His research interests include personnel selection, applied psychometrics, older worker employment/career issues, and retirement. He has published over 30 articles and made more than 60 presentations at regional and national conferences. He has also published book chapters and encyclopedia entries, as well two books: *Measurement Theory in Action: Case Studies and Exercises* coauthored with D. J. Whitney and *Aging and Work in the 21st Century* coedited with G. A. Adams.

Steve Sizoo is Associate Professor of Management and International Business at Eckerd College. He holds BS and MBA degrees from the University of Southern California, and the DBA degree from Nova Southeastern University. Following 15 years working as a marketing executive with

multinational corporations, he turned to teaching and has been on the faculty at Eckerd College since 1992. His research interests and publications focus on intercultural issues, business education, and tourism.

Aaron Smith, PhD, is Professor of Sport Management at La Trobe University, Melbourne, Australia. He is a regular consultant to the sport industry and corporate world in consumer psychology and organizational change management. Smith's research focuses on individual responses to change, the management of organizational change, and contextual forces for change. He has also worked extensively on the analysis of the global sport industry and its future. Smith is author or coauthor of more than 10 books examining various aspects of sport business and change. He holds a doctorate in management.

Scott Somers, PhD, has been a member of the Phoenix (Arizona) Fire Department since 1996 and is assigned to the Special Operations Division. He is a paramedic who specializes in toxicology and hazardous materials response. Somers is also an elected member of the Mesa City Council, a faculty associate in both the School of Public Affairs and the College of Technology Management at Arizona State University, and serves on the Coordinating Council for the Arizona Department of Homeland Security. His principal research interests include continuity of operations, high-reliability organizations, and disaster planning and response.

John Steen is a Senior Lecturer in Strategic Management and a member of the Enterprise and International Business research group at University of Queensland Business School. He holds PhDs from the University of Tasmania (Biochemistry) and the University of Queensland (Strategic Management). Prior to becoming a lecturer in business strategy, he was involved full-time in medical research. His current research and teaching focus within innovation and strategic management reflects an ongoing interest in intangible resources such as knowledge and information and the way that they contribute to strategic choice and sustained competitive advantage and he currently provides consulting services to a prominent Australian telecommunications company.

Christoph Stöckmann, PhD candidate, researches and teaches management at the University of Duisburg-Essen, Germany, where he is a member of the e-business and e-entrepreneurship research group. He graduated in 2005 with a diploma in business administration and information science from the University of Duisburg-Essen, Germany. His current research activities focus on the interface of entrepreneurship and strategic management.

Micheal T. Stratton, PhD, is an Assistant Professor of Management in the Department of Economics and Management at Hood College in Frederick, Maryland. He earned his doctorate in Public Administration and Policy from the Univer-

sity at Albany, SUNY. His current research is focused on the connection between emotions and the technological aspects of organizational life important to managers, leaders, and employees with specific attention to electronic monitoring and personal Internet use at work. His work has appeared in *Research on Emotion in Organizations: The Effect of Affect in Organizational Settings* and a number of works in progress and in press articles/book chapters are forthcoming.

Sully Taylor, PhD (University of Washington), is Professor of International Management and Human Resource Management at Portland State University, School of Business Administration, and Associate Dean and Director of Academic Programs. Her research focuses on the creation of effective global HRM systems in multinational firms, including global leadership development, the management of women expatriates and sustainable HRM. Taylor has authored or coauthored a number of articles on her research, which have been published in leading journals. She is also the coauthor (with N. Napier) of Western Women Working in Japan: Breaking Corporate Barriers.

Rajan A. Thillai is currently an Assistant Professor in the Department of Management Studies at IIT Madras where he teaches Finance and Strategy courses for the MBA program. Prior to joining academia, Thillai was working at Infosys Technologies, a top IT solutions company in India. His research areas include IT industry, Corporate Finance, Venture Capital, and Globalization.

Mohan Thite is Senior Lecturer in Griffith Business School, Griffith University, Australia. He has over 20 years of experience as an HR professional, both in industry and academia. His current research is spread over diverse areas of HRM such as SHRM in the knowledge economy, management of knowledge workers, HRM in the Indian IT/BPO industry, and HRIS. His publications include a recent book on *Managing People in the New Economy*, an upcoming edited book on HRIS with M. Kavanagh, and several papers in academic journals and books.

Nicole Torka, PhD, Assistant Professor in Human Resource Management, Department Operations, Organizations and Human Resources, University of Twente. Her current research is still focused on the flexible labor/commitment link, but her interest turned from employee into employer commitment including the so-called new employment relationship. Furthermore, her research experience and interest involves other employee attitudes (i.e., psychological contract, job satisfaction) and worker participation.

Eva Traut-Mattausch, after receiving her PhD in Social/ Organizational Psychology in Munich, Germany, started working at the Ludwig-Maximilians-University Munich as an assistant professor in August 2004. Her research interests focus on improving innovation, overcoming resistance to change, intercultural differences, leadership, and women in management. **Fu-Sheng Tsai** (PhD, I-Shou University, Taiwan) is an assistant professor in the Department of Business Administration, Cheng Shiu University, Taiwan. His research interests are on the intersection of knowledge management, social networks and entrepreneurship in the context of Chinese society. He has published his works in *Knowledge Management Research & Practice*, *Pan-Pacific Management Review* and other Chinese mainstream journals like the *Journal of Technology Management*.

Rob van Tulder, Professor of International Business, RSM Erasmus University Rotterdam, department of Business-Society Management. Recent books include The Logic of International Restructuring (1995), Reputations at Stake (2003), International Business-Society Management: Linking Corporate Responsibility and Globalization (2006), and Skill Sheets: an integrated approach to research, study and management. Winner of various awards and published on a variety of topics such as multinationals, high-tech, corporate social responsibility, codes of conduct, development, the car industry, issues of standardization, network strategies, smaller industrial countries, and European Community/Union policies. He is the coordinator of the SCOPE databank project (which results in the annual listings of the world's largest TNCs from developed and developing countries in the World Investment Report of UNCTAD).

Martijn van Velzen is an assistant professor at the School of Management and Governance of the University of Twente (the Netherlands). He holds an MA in Sociology from the University of Groningen. For his doctoral thesis on training for flexible workers, he received a PhD from the Department of Law of the University of Amsterdam. His research experience involves the comparative study of industrial relations, flexible employment, active labor market policies, human resource management, and vocational education and training. He is a contributing member of the International Relations Association's Study Group on Flexible Work Patterns.

Yoav Vardi has been a faculty member with the Department of Labor Studies at Tel Aviv University since 1980. He received his PhD in organizational behavior from the New York State School of Industrial and Labor Relations, Cornell University, where he recently spent his sabbatical as a visiting professor. Yoav's areas of interest are organizational careers and organizational misbehavior. His book on misbehavior in organizations (coauthored with E. Weitz) was published in 2004. His articles appeared in the Academy of Management's Journal and Review, Journal of Vocational Behavior, Psychological Reports, Organization Science, and the Journal of Business Ethics.

Matti A. Vartiainen, PhD, Professor of Learning Organization at the Laboratory of Work Psychology and Leadership (Helsinki University of Technology, Department of

Industrial Engineering and Management). He is leading the Virtual and Mobile Work Research Unit (http://vmwork. tkk.fi) at BIT Research Centre (http://www.bit.hut.fi/). His research interests cover the fields of organizational innovations, mobile distributed work, reward systems (http://www.palkitseminen.hut.fi), knowledge and competence building, collaboration, and e-learning systems.

Alfred Vernis is a member of the Institute of Public Management (IDGP) and the Institute of Social Innovation at ESADE. He currently manages the Social Enterprise Knowledge Network (SEKN) research at ESADE, led by the Harvard Business School and supported by Fundación Avina. He has published various articles and books on management in the third sector. He is a coauthor of *Nonprofit Organizations: Challenges and Collaboration* (2006) and *Effective Management of Social Enterprises* (2006). In recent years, he has collaborated on strategic planning tasks with Intermón-Oxfam, Medicus Mundi, the Jesuit Refugee Service, and so forth. He is a member of the Board of Trustees of the Fundació Catalana de l'Esplai (Barcelona).

Gianmario Verona is an Associate Professor of Management at Università Bocconi, where he is also Associate Director of the PhD in Business Administration and Management, and is currently Visiting Professor at Tuck School of Business. He holds a PhD in Management, and he served as a Research Assistant at the Massachusetts Institute of Technology (1997–1998). His research interests include user innovation and the role of new product development in firms' strategic renewal. He published several international articles in leading journals among which Academy of Management Review, Industrial and Corporate Change, Journal of Interactive Marketing, and MIT Sloan Management Review.

Kim-Chi Wakefield Trinh is an Assistant Professor in Business Policy at the National University of Singapore Business School. She holds a BA from Cornell University and a PhD from Duke University. Before joining academia, Kim-Chi was an investment banking associate for Smith Barney and a country manager for Aetna International in Asia.

Mo Wang, PhD, is an Assistant Professor of Psychology at Portland State University. He received his PhD in both indus-

trial-organizational psychology and developmental psychology from Bowling Green State University in 2005. He also had a minor in quantitative methods. His research interests include expatriate management, global/cross-cultural HR practice, older worker employment, and retirement. He has published his work in *Journal of Applied Psychology, Personnel Psychology, Psychology and Aging, Organizational Research Methods, Educational and Psychological Measurement*, and *Personality and Individual Differences*. He has also been contracted by several Fortune 500 companies to provide consulting services in both English and Chinese.

Ely Weitz, PhD, Senior Lecturer at the Department of Labor Studies, Tel Aviv University, heads the Executive Master's Program in Labor Studies. He was Visiting Professor at Baruch College, Zicklin School of Business. Weitz also worked for Chemical Bank, New York, in their Human Resources Division. His research interests include organization theory, management history, management and organization development, and misbehavior in organizations. Weitz has recently published a book on organizational misbehavior (with Y. Vardi) titled *Misbehavior in Organizations: Theory, Research and Management*.

Peter J. Williamson is Professor of International Management and Asian Business at the INSEAD in Singapore and Visiting Professor at the Judge Business School, University of Cambridge. Formerly at The Boston Consulting Group, he serves on the boards of several companies. He holds a PhD in Business Economics from Harvard University.

Donna J. Wood, David W. Wilson Chair in Business Ethics, University of Northern Iowa, is a founder and past president of the International Association for Business and Society, and served as editor of *Business & Society*. She is also past-president of the Society for Business Ethics and the Social Issues Division of the Academy of Management. She has published many articles and books, and has won awards for her innovative and influential work. With three colleagues, she recently completed a book, *Global Business Citizenship: Transforming Ethics and Sustainable Capitalism.* Her most recent book is *Business Ethics: Text and Workbook*, published in 2007 by Woodhaven Press. Her current interests include global business citizenship, business ethics, corporate social performance, and stakeholder theory.

PART VIII

TEAMING IN AND BEYOND ORGANIZATIONS IN THE KNOWLEDGE ECONOMY

THE EVOLVING NATURE OF WORK TEAMS

Changing to Meet the Requirements of the Future

TJAI M. NIELSEN

George Washington University

xamples of teamwork abound from every facet of our lives. Firefighting, terrorist response, and paramedic teams work to make our environment a safer place. Sales, new product development, and customer service teams try to make our lives more comfortable. Automotive assembly and clothing manufacturing teams make products we use every day. Essentially,

Teams of people working together for a common cause touch all our lives. From everyday activities like air travel, firefighting, and running the United Way drive to amazing feats of human accomplishment like climbing Mt. Everest and reaching for the stars, teams are at the center of how work gets done in modern life. (Kozlowski & Ilgen, 2006, p. 78)

Hospitals across the globe are turning to hospital rapid response teams (HRRTs) in an effort to increase the speed and quality of patient care (Simmons, 2004). When Bank of America recently merged with FleetBoston Financial, transition teams were employed to develop Six Sigma plans for the new, combined company (Costanzo, 2004). Hewlett-Packard created a Corporate External Standards Team with members in 16 countries that was responsible for interpreting government regulations for product designers (Snyder, 2003). Chevron established interfunctional work teams in an effort to maximize the use of human resources in a key profit center (Attaran & Nguyen, 2000). Sabre, Inc., an organization in the travel industry, uses cross-functional

virtual teams within its sales, operations, and finance divisions (Kirkman, Rosen, Gibson, Tesluk, & McPherson, 2002). The application of teams is widespread with many organizations considering teams an absolute necessity.

The necessity of teamwork was stark during the aftermaths of the Indian Ocean Tsunami and Hurricane Katrina. During the response to these tragic, natural disasters, we watched emergency response teams assist victims in a number of different ways. Helicopter crews plucked victims stranded in trees and on rooftops. National Guard units secured unprotected areas and searched for survivors. Search and rescue teams saved thousands of stranded people. Red Cross food delivery teams fed victims. Surgery teams performed operations on those who were severely injured. Construction crews led efforts to remove debris and begin the rebuilding process. The types of teams responding to these natural disasters all had very different responsibilities and approaches to accomplishing their goals, but what would have happened without them? Many organizations rely on teams to perform required tasks without which the organization could not function effectively.

From nautical teams sailing Greek merchant ships as early as 350 BCE to bank wiring teams operating in Western Electric's Hawthorne Works in the 1920s to digital animation teams creating special effects for today's movies, the application of teams and research on their effectiveness has a rich history. Understanding key elements of this history is important for considering the future of work teams,

a primary purpose of this chapter. Thus, this chapter offers a brief and selective history of teams, discusses presentday applications, and considers three key factors deemed important for the future.

This chapter begins by defining *work team*, discussing different types of teams and what they do, and operationalizing team effectiveness. Next, a brief history of the application and study of teams provides context for the remaining portions of the chapter. The final section, with an eye to the future, is intended to be the primary thrust of this paper. It concentrates on three factors that will directly impact the performance and viability of teams in the future: (a) fundamental dilemmas of teamwork, (b) workplace globalization, and (c) the virtual work environment.

WORK TEAMS: DEFINITION AND EFFECTIVENESS

Both work group and work team are defined as "interdependent collections of individuals who share responsibility for specific outcomes for their organizations" (Sundstrom, DeMeuse, & Futrell, 1990, p. 120). Two elements of this definition are worth emphasizing. First, interdependence indicates that team members depend on each other to do their work. Consider a basketball or softball team where each team member depends on other members when trying to deliver a win. Second, team members share responsibility for delivering a certain product or result to the organization or larger social system within which they operate. This often puts pressure on individual team members to sacrifice their personal goals for those of the team. In certain cultures (individualist vs. collectivist), allowing individual goals to be subsumed by team goals is often difficult because it goes against core psychological drivers of self-preservation (Nielsen, Edmondson, & Sundstrom, 2007). These two elements of how teams operate are important to keep in mind, especially when considering different types of teams and elements of team effectiveness.

Types of Teams

How do we differentiate one type of work group from another? It is important to categorize teams so that we have a better understanding of what they do and how they are different. While no theory or taxonomy captures every type of team working today, several models are helpful for understanding the contexts and challenges that different types of teams face. A system for organizing team types would ideally use mutually exclusive and exhaustive categories.

Hackman (1990) used a seven-category typology, which included (a) top management groups, (b) task forces, (c) professional support groups, (d) performing groups, (e) human service teams, (f) customer service teams, and (g) production teams. The management literature has also provided different examples of team classifications.

Sundstrom, McIntyre, Halfhill, and Richards (2000), building on earlier typologies, identified six types of work teams: (a) action and performing teams (e.g., surgery and SWAT teams); (b) advisory teams (e.g., task force); (c) management teams (e.g., regional leadership teams); (d) production teams (e.g., paper mill work crews); (e) project teams (e.g., new product development teams); and (f) service teams (e.g., consulting teams). In a more recent effort, Devine (2002) suggested integrating previous typologies.

A categorization system developed by Devine (2002) focuses on seven underlying contextual dimensions (i.e., fundamental work cycle, physical ability requirements, temporal duration, task structure, active resistance, hardware dependence, and health risk) and suggests that teams should be divided into an intellectual work teams cluster (i.e., executive, command, negotiation, commission, design, and advisory) and a physical work teams cluster (i.e., service, production, performance, medical, response, military, transportation, and sports). Devine suggests 14 different types of teams, each having specific functions: (a) executive teams plan and direct (e.g., board of directors, senior management team); (b) command teams integrate and coordinate (e.g., control tower, combat center teams); (c) negotiation teams deal and persuade (e.g., labor-management, international treaty); (d) commission teams choose and investigate (e.g., search committee, jury); (e) design teams create and develop (e.g., research and development [R&D], marketing); (f) advisory teams diagnose and suggest (e.g., quality circle, steering committee); (g) service teams provide and repair (e.g., fast food, auto service); (h) production teams build and assemble (e.g., home construction, automobile assembly); (i) performance teams enact and display (e.g., movie cast, orchestra); (j) medical teams treat and heal (e.g., surgery, emergency room); (k) response teams protect and rescue (e.g., fire station, paramedic); (l) military teams neutralize and protect (e.g., tank crew, infantry squad); (m) transportation teams convey and haul (e.g., airline cockpit, train crew); and (n) sports teams compete and win (e.g., baseball, soccer). Different factors affect the performance of different types of teams across multiple contexts. Next, concepts are explored that help reveal the essential components contributing to team effectiveness.

Team Effectiveness

Two key elements comprise team effectiveness: performance and viability (Sundstrom et al., 1990). *Performance* entails the successful delivery of an output (i.e., products, decisions, performance events, services, or information) to customers inside or outside the organization. The concept of *group viability* is future oriented and includes *continuity* (ability to maintain a core group membership), *commitment* (to a shared group purpose), *cohesion* (commitment to and liking of team members), and *capability* (to accomplish the shared purpose; Halfhill & Huff, 2004). To be successful, teams must focus on both performance and viability.

4 • TEAMING IN AND BEYOND ORGANIZATIONS IN THE KNOWLEDGE ECONOMY

Researchers have offered different explanatory models (Hackman & Morris, 1975; McGrath, 1964; Sundstrom et al., 1990) to help accurately conceptualize team effectiveness. McGrath (1964) pioneered the widely cited "inputprocess-output" (IPO) model of group effectiveness. While this idea is over 40 years old, almost all models of work group effectiveness still rely on it to some extent. McGrath suggested that inputs are the key cause of processes that then mediate the effect of inputs on outcomes. Inputs are the personal elements (expertise, status, personality, and experience) people bring to a team when it is formed; process variables involve the interaction among team members (social exchange of information, influence attempts, and leadership) and are inherently dynamic, and outputs are the products yielded by the group (Guzzo & Shea, 1992). Of these, process variables have been the most difficult to accurately measure and understand because they are highly context dependent and dynamic (Edmondson, Roberto, & Watkins, 2003). The dynamic nature of team processes contradicts their static operationalization in most research on teams.

Team effectiveness should be more accurately conceptualized as embedded in a multilevel system that has individual, team, and organizational-level aspects; which focuses centrally on task-relevant processes; which incorporates temporal dynamics encompassing episodic tasks and developmental progression; and which views team processes and effectiveness as emergent phenomena unfolding in a . . . larger organization system or environmental context. (Kozlowski & Ilgen, 2006, p. 80)

Understanding what drives team effectiveness is complex and requires special attention to the context within which teams perform their tasks. Team contexts are multifaceted and have, to date, been difficult for researchers to define and measure (Nielsen et al., 2007). This, among other challenges, has prevented research on teams from being readily applicable to real teams attempting to improve their effectiveness. Progress based on previous research and practice is being made, however, and highlights the importance of carefully considering the history of teams.

A BRIEF HISTORY OF WORK TEAMS

The application of work teams is centuries old. The documentation of their application in book chapters and research articles, however, often begins with the Hawthorne Studies conducted in the 1920s and 1930s. The Hawthorne Studies included a series of projects led by a team of Harvard researchers and represents one of the first empirical investigations of factors related to team effectiveness (Roethlisberger & Dickson, 1939).

Some of the most impactful results from the Hawthorne Studies involved the "Bank Wiring Observation Room" (Homans, 1950). Sundstrom and his colleagues (2000) observed.

Among legacies for later research and application concerning work groups were: detailed illustration of methods for studying groups in work settings; evidence of development of informal groups among workers; evidence of mutual relevance of formal and informal social structure; demonstration of informal production norms in work groups; and perhaps most interesting, a clear example of a work group enforcing a production norm. (p. 45)

During this time, however, individual employees still performed the vast majority of work. The exceptions were primarily from military and manufacturing environments (i.e., cockpit and tank crews and informal automobile assembly teams).

After the Hawthorne Studies, researchers, rather than managers, expressed the majority of interest in work teams. In other words, the rate of research increased, whereas the application of work teams did not. Primarily, psychologists performed much of the early research involving work teams. They studied automobile factory workers (Walker & Guest, 1952), B26 flight crews (Torrence, 1954), and industrial work groups (Seashore, 1954). In fact, two researchers identified over 2,100 studies on small groups published between 1950 and 1959 (McGrath & Altman, 1966). Industrial/organizational psychologists followed their colleagues in social psychology by studying teams in organizational settings as opposed to the laboratory. While there was a significant amount of research conducted through the 1950s, the application of teams did not become popular until the 1980s.

The increased interest from organizations for implementing work teams can be linked to the advent of total quality management (TQM). Organizations such as Ford Motor Company, Lockheed-Martin, and Motorola began experimenting with multiple types of teams. First, quality circles were attempted, and then some companies started performing production, project, and service work with teams. Many organizations realized the benefits of teambased approaches by achieving increases in productivity, efficiency, and quality. For other organizations that failed to implement appropriate support mechanisms, the benefit of teams fell far short of their promise. This, however, did not deter a number of companies from experimenting with team-based structures.

The implementation of teams to perform a variety of tasks became commonplace in the 1990s. Kodak (customer service teams), Chevron (interfunctional teams), Dow Corning (self-managed teams within a unionized context), Motorola (self-managed teams within a nonunionized context), and Miller Brewing Company (cross-functional teams) are just a few examples of the application of teams within organizations.

Today, teams are ubiquitous across continents, industries, and organizations. The widespread use of teams, however, does not imply that successful teamwork is achieved without overcoming significant challenges. Emergency response teams, whether they are search and rescue or paramedic teams, consistently face unpredictable environments.

The challenge of managing this lack of certainty, while maintaining effectiveness, is significant for these types of teams. Emergency response team members must overcome the difficulty of coordinating with teammates, making their team's effectiveness their first priority, and asking for help when necessary. Management teams, while facing a significantly different work environment, face similar challenges. They must deal with a significant amount of complexity and make decisions that will benefit as many of their key stakeholders as possible. Management team members must represent the part of the organization for which they are responsible, while keeping the success of the organization paramount. Bank of America's transition teams were tasked with implementing Six Sigma in an environment with brand new employees from FleetBoston (Constanzo, 2004). Managing external relationships and staying focused on key milestones were two challenges for these transition teams. To be effective, individual team members must consistently share information and perform their individual roles. Virtual teams at Sabre, Inc., (Kirkman et al., 2002) encountered entirely different circumstances having to do with learning to trust and communicate without meeting teammates face-to-face. Individually, virtual team members faced the challenge of accurately understanding and communicating information transmitted electronically. Identifying all of the difficulties faced by different types of teams and their members working in disparate contexts is beyond the scope of this chapter. I contend, however, that teams will face three related sets of challenges in the future: (a) fundamental teamwork dilemmas, (b) globalization of the workplace, and (c) an increasingly virtual work environment.

KEY CHALLENGES FOR TEAMS IN THE FUTURE

The environments and contexts within which teams work will expand exponentially in the future. First, the expanding globalization of the workplace will lead to a significant increase in the cultural and experiential diversity of team members. Second, teams will increasingly complete their work virtually, in part due to their expanding global reach. The ability for teams to effectively manage diversity and virtuality will partially determine their ability to survive and flourish. Teams have faced a third set of challenges, fundamental team dilemmas, for years. Because these dilemmas are ubiquitous across teams and core to their functioning, however, they are intertwined with and affected by team diversity and virtuality. Therefore, these dilemmas are covered first and are then used to frame subsequent discussions on globalization and the virtual work environment.

FUNDAMENTAL TEAM DILEMMAS

Organizing around work teams can provide tremendous benefits. Some of these include increased efficiency of production, faster and more flexible response to customer needs, greater levels of responsibility for individuals, less hierarchy, enhanced strategic leadership, the generation of multiple alternatives, and increased commitment to team goals. These benefits, however, are not realized by simply putting people who are accustomed to working individually into teams. The benefits of organizing in teams can only be realized when teams and their members are able to recognize and manage four fundamental teamwork dilemmas.

A significant amount of research indicates that individual team members must develop teamwork skills to be effective within a team context (Stevens & Campion, 1994). Specifically, researchers have focused on the ability of individual members to successfully manage interpersonal relations, the ability to maintain healthy working relationships, and the ability to effectively manage conflict (Hackman & Morris, 1975; Perkins & Abramis, 1990). Little doubt exists that these skills and abilities are important individual elements contributing to team effectiveness. Less effort, however, has been spent addressing the most fundamental individual dilemmas that manifest themselves as constraints to team effectiveness: (a) the willingness of team members to put team needs/goals ahead of their own and (b) the ability for team members to proactively manage their emotions.

Self-Interest Dilemma

The most effective teams are comprised of individuals who recognize what is best for the team and willingly behave in a manner that supports the team (Hackman, 1987). Teams with such members, however, are few and far between because the process of sacrificing individual goals for those of the team goes against core psychological drivers involving self-preservation and promotion (Kramer, 1989). The dilemma team members face when forced to make tough choices between individual and team priorities represents the self-interest dilemma (SID; Nielsen, Edmondson, & Sundstrom, 2007). A number of examples exist where self-interest takes priority over group-interest. A team member may choose to leave work early to spend time with family while his or her teammates are in the middle of a complex project, or someone might emphasize his or her individual contributions over and above the efforts of teammates for purposes of promotion. A more complex example might include a new product development team member who represents the marketing department arguing that more budget resources should be allocated to market research, when, in fact, additional resources would be better spent on new production technologies. The self-interest dilemma is a relative constant for team members in today's organizations. Evidence exists, though, that group norms and rewards are two areas that offer approaches to effectively managing the self-interest dilemma.

A significant amount of work has examined the impact of specific reward structures for teams versus individuals (e.g., DeMatteo, Eby, & Sundstrom, 1998). This is based on the idea that reward systems affect individual, team,

and organizational behavior in important ways (Lawler, 1990). Specifically, rewards motivate work performance when employees believe their organization links important rewards to effective performance and when they believe they can influence that performance. Many organizations make the mistake of rewarding employees for behavior that does not contribute to organizational success (Kerr, 1975). Sports teams are prime examples as they seek team accomplishment, yet reward team members for their individual achievements. Ironically, a number of organizations who use teams also reward individual performance. The remedy, according to researchers, involves matching a team's reward structure to its performance goals (Lawler, 1999). Specifically, rewards based on team and organizational performance will drive integration and teamwork far better than rewards based solely on individual performance (Schuster & Zingheim, 1992). For example, it seems more likely that a professional basketball player would agree to a slight reduction in base salary (so the team could hire more talent) if 75% of his overall compensation was tied to his team's performance. Team members are less likely to compete against one another if their rewards depend on team performance. In addition to rewards, team norms and culture play important roles in determining team member behavior (Feldman, 1984).

Group norms contribute to group culture, which impacts almost every facet of team member behavior (Feldman, 1984). Therefore, one method for mitigating the SID is to develop an environment where team members receive fair treatment, expect to contribute equally, and are mutually committed to accomplishing team goals. Creating group norms around each of these three facets should be an important area of focus for team leaders and members. In his seminal paper on the development of group norms, Feldman (1984) stated, "Group norms are the informal rules that groups adopt to regulate and regularize group members' behavior" (p. 84). One key method for group norm development involves explicit statements and behaviors from team leaders. A group norm of fair treatment will develop when team leaders consistently and uniformly enforce rules and avoid favoritism. Mutual commitment to team goals is a group norm that develops when team leaders engage each member of the team in the development of those goals. Objectives created in the absence of team input will be less likely to engender mutual commitment. Developing the appropriate reward structure and creating positive group norms are two approaches for effectively managing the SID. Do these areas offer the same promise for managing our second, individual-level dilemma involving the management of emotion?

Emotion Recognition Dilemma

We can all recount situations where we let our emotions get the best of us. We likely said some things we did not mean and behaved in a manner that was not appropriate given the situation. The ability to recognize and manage our own emotions is very valuable both at work and in our personal lives. One example commonly observed in teams involves a team member strongly defending his or her perspective regardless of its merits (Borisoff & Victor, 1998). The defensive team member in this situation is thinking much more about individual pride than the veracity of his perspective (Maultsby, 1986). In other words, his communication is being driven primarily by emotion. The dilemma in this type of situation is the ability for individuals to maintain an awareness of their emotions in order to assess whether their behavior is being driven by their own ego needs or what is best for the team, also called the emotion recognition dilemma (ERD). Team members must understand the underlying motivation for their own defensive behavior to overcome this dilemma. Team members who recognize that emotion and the fear of looking incompetent are driving their defensive behavior are better able to prevent this type of behavior for the benefit of the team. The ability to effectively recognize one's own emotions in this manner is one element of emotional intelligence (Daus & Ashkanasy, 2005).

An emotionally intelligent person is better able to recognize and manage her own emotions and those of others around her than someone who is not. Past research has found that teams with members high in emotional intelligence perform more effectively (Jordan, Ashkanasy, Hartel, & Hooper, 2002). In other research, Jordan and Troth (2004) examined the role of team member emotional intelligence during problem solving and conflict resolution. The authors not only wanted to know if emotionally intelligent teams performed more effectively, but also if emotionally intelligent team members were better able to manage conflict. After analyzing problem-solving activities of 108 work teams, results indicated that while there was significant conflict within teams, teams with higher average emotional intelligence performed more effectively than others. This study more directly addresses the possible impact of emotional intelligence on the ability to deal with the ERD because while team members were engaged in conflict, their emotional intelligence facilitated the recognition of the emotion involved and led to more constructive resolutions. Is emotional intelligence relevant for managing fundamental dilemmas that occur at the team level? We address this question in the next section of this chapter by examining two team-level dilemmas involving the asymmetry of information and interest.

Information Asymmetry Dilemma

Information sharing is a team process variable that is vitally important to effective team functioning. When information is not available to all team members, actively shared among teammates, or distributed equally, effectiveness can suffer. Consider the top management team of a pharmaceutical company that has a potentially harmful drug

on the market. This team must decide whether to pull this drug from the market. A lack of information sharing among teammates could significantly degrade the quality of the team's decision. Imagine a new product development team in a technology company with members from a variety of functional areas such as development, engineering, manufacturing, marketing, and sales. To successfully develop, design, build, advertise, and sell a new product, each member of this team must share all necessary information. When different team members have unique, unshared information about a specific situation on which they must act, they will encounter the information asymmetry dilemma (IAD; Edmondson et al., 2003).

Power can be defined as the ability to influence the actions and behaviors of others and to make them do what they would ordinarily not do (Salancik & Pfeffer, 1974). Typically, team leaders hold the most power within teams, but this varies depending upon a variety of factors. The ability of team leaders to demonstrate strategic leadership (Nielsen & Halfhill, 2006) is one factor, while the relative power of other team members is another. The degree to which team leaders have significantly more power than team members will influence the tendency for team members to consistently share information because they will defer to their leader. Teams with greater power differentials between team leaders and members are more likely to encounter the IAD (Edmondson et al., 2003). Consider the example of the pharmaceutical company's top management team that is trying to determine whether to remove one of their drugs from the market. If the CEO has significantly more power and decides to pull the drug, it is less likely that a less powerful member of the team will offer information contradicting that decision. In addition to power within teams, the degree of psychological safety within teams likely influences their ability to manage the IAD.

Psychological safety is defined as "the shared belief that the team is safe for interpersonal risk-taking" (Edmondson, 1999, p. 351). Members of teams with high levels of psychological safety are more likely to express themselves because they are less likely to be ridiculed, marginalized, teased, or punished for speaking up. This type of environment mitigates the impact of the IAD because team members feel comfortable sharing whatever information or opinions they possess. Teams, however, vary in their levels of psychological safety due to different group norms (Edmondson, Bohmer, & Pisano, 2001), team leader behavior (Nielsen & Halfhill, 2006), and power differential (Pfeffer, 1992). Work on power and psychological safety also offer methods for managing the interest asymmetry dilemma.

Interest Asymmetry Dilemma

Shared goals are a central component necessary for maximizing team performance. While the link between team members sharing the same goals and team performance is logical, the frequency of its occurrence is rare. Team mem-

bers have unique personalities, goals, and interests, which may not align with team goals. Consider a management consulting team made up of team members with clearly defined roles and responsibilities (e.g., sales, negotiation, execution, and management) working with a client on improving leadership development. While consulting team members may support the overall goal of improving client performance, it is likely that team members will be more interested in their primary area. For example, once the client has agreed to a service contract, the team member responsible for sales may be much less interested in fully participating, which might anger the client. Another example might involve a production team responsible for the assembly of automobiles tasked with learning a new door assembly process. Team members not involved with door assembly may be less engaged in learning new techniques, which will slow down the team as a whole. These examples represent teams facing the interest asymmetry dilemma, which is defined as "the degree to which team members have divergent interests in a given situation" (Edmondson et al., 2003, p. 303). If teams want to maximize their performance, they must consider and directly deal with this dilemma. The more common action is that team members cooperate to achieve some group goals and compete to further individual interests (Bazerman, Mannix, & Thompson, 1988).

Research suggests that teams with high levels of power centralization (team leaders with significantly more power) and divergent interests perform more poorly. In other words, teams with members having different levels of interest in a particular area will be more likely to perform poorly when one team member clearly has the most power. This interaction between power and interest affects team effectiveness. Thus, because power differences are difficult to change, especially in the short term, teams and their members will contribute more to their effectiveness by focusing on aligning interests. The absence of interest alignment in teams with significant differences in power will hurt team effectiveness. Psychological safety offers a different perspective on the interest asymmetry dilemma.

Team members who feel safe and comfortable enough to speak freely are part of teams who learn and perform more effectively (Edmondson, 1999). How does this research relate to teams with divergent interests? While there has been little research on the effect of psychological safety on team member interests, it seems plausible that team environments with greater levels of information sharing would result in a greater understanding of other team members' interests. In other words, when team members feel comfortable enough to openly share their thoughts, they will likely express their interests even if they are significantly different from those of other team members. Frank dialogue about the benefits and risks associated with actions based on different interests will be more likely to occur and subsequently lead to successful resolution. Thus, it seems likely that the negative impact of interest asymmetry will be mitigated by high levels of psychological safety (Edmondson et al., 2003).

GLOBALIZATION

Globalization has been called the "most profound business phenomenon of the 20th century" (Hitt, Bierman, Uhlenbruck, & Shimizu, 2006, p. 1137). It involves businesses expanding their operations to other countries and has created a global economy that shows no signs of slowing. Many large and small companies operate in multiple countries and employ people from every corner of the globe. Gillette, a consumer products company known for its shaving products, is headquartered in the United States while more than half of its employees work in other countries. ConocoPhillips, the third largest integrated energy company in the United States, operates in more than 40 countries. A smaller company, VisualSoft Technologies is headquartered in India with offices spread across the globe. These are just a few examples of global organizations utilizing teams. Teams in the global business environment bring people together with a significant diversity of culture and experience. We know from past research on teams that diversity creates unique challenges for teams to manage. The next section of this chapter considers the challenge of cultural diversity within the context of the four fundamental dilemmas of teamwork.

Self-Interest Dilemma

As discussed earlier in this chapter, the self-interest dilemma essentially involves the challenge of choosing between individual and team priorities. This dilemma is partially driven by a team member's level of individualism, which is partially determined by his or her cultural background. Research has determined that cultures can be distinguished by their level of individualism (Hofstede, 2001).

In his seminal work examining cultural differences across countries, Hofstede (2001) established individualism as one of five broad dimensions of cultural values. Individualism is defined as the degree of individual independence and is typically contrasted with collectivism, which emphasizes the importance of groups and social loyalty. Team members with highly collectivistic cultural orientations will often prioritize their team's needs over their own, reducing the potential negative impact of the self-interest dilemma. Most teams, however, will be comprised of individuals from both individualistic and collectivistic countries. This puts a premium on team members understanding the cultural backgrounds of their teammates. The ability for teammates to recognize cultural differences and use this understanding to perform more effectively is highly related to their level of cultural intelligence (CQ).

Cultural intelligence is defined as "a person's capability to function effectively in situations characterized by cultural diversity" (Van Dyne, Ang, & Nielsen, 2007). It is a multidimensional construct comprised of four key capabilities: (a) metacognitive CQ, (b) cognitive CQ, (c) motivational CQ, and (d) behavioral CQ. Metacognitive CQ is

how people make sense of intercultural experiences by reflecting on their own thinking and that of others. Cognitive CQ represents a person's knowledge and understanding of how cultures are similar and different. Motivational CQ is a person's ability to direct energy and effort toward learning about and functioning in cross-cultural situations. Behavioral CQ is a person's ability to appropriately adapt his or her verbal and nonverbal behavior for different cultures.

Past research has found strong relationships among CQ, decision making, task performance, and adaptability. Work teams comprised of members with high levels of cultural intelligence will more effectively manage *and* capitalize on their own cultural diversity. The importance of CQ will continue to increase as teams become more culturally diverse. While not as significant, CQ will also play a positive role in recognizing the impact of one's own emotions on others.

Emotion Recognition Dilemma

Recognizing and managing our own emotions is a very valuable skill. The ways in which emotion is displayed can be interpreted in different ways depending on one's cultural background. For example, some cultures emphasize that emotional displays be kept to a minimum while others value the open sharing of emotion. Cultural diversity, therefore, could potentially exacerbate the impact of the emotion recognition dilemma. Team members from diverse backgrounds will have to spend additional time considering the possible impact of their emotions on team members and the role of culture when interpreting a team member's emotions. Emotional intelligence and cultural intelligence play important roles in a team's ability to manage this dilemma.

Emotional intelligence is defined as the ability to recognize and manage one's own emotions and those of others (Mayer, Salovey, & Caruso, 2000). Successfully managing the ERD requires that team members recognize the degree to which emotion drives their behavior and if it is decreasing team effectiveness. Team members with higher levels of emotional intelligence are better equipped to do this consistently. The ability to recognize emotion, however, is only the first step within a team environment characterized by diversity. That is, team members' cultural backgrounds play an important role in their display and interpretation of their own and others' emotions. Therefore, cultural intelligence must augment emotional intelligence to most effectively manage the ERD. Team members with higher levels of emotional and cultural intelligence will be more likely to understand the emotional norms of multiple cultures. This will facilitate their ability to more effectively interpret the meaning of their teammates' emotions and the possible cultural implications of their own emotional displays.

Consider the example of Matt who is confronted with candid performance feedback and reacts in a defensive and emotional manner by launching a personal attack on his manager (the source of feedback), who is from a different cultural background. Matt's level of emotional intelligence will partially dictate his ability to recognize the inappropriateness of his reaction. Without a high degree of cultural intelligence, however, Matt will not understand how his manager will interpret his emotional outburst. As teams become increasingly diverse, both emotional and cultural intelligence will be required for teams that want to perform effectively. Increasing levels of cultural diversity due to globalization will also have an impact on the information and interest asymmetry dilemmas.

Information Asymmetry Dilemma

The degree to which team members operate with similar levels of information is critically important to a team's level of success. Teams without strong norms of information sharing face significant challenges when making important decisions. Consider the example of a student project team that must deliver a research paper at the end of the semester. If team members are responsible for researching specific topics and do not actively share the information they gather, the team will be unable to fully understand the research problem, make the appropriate decisions to move forward, and ultimately deliver on its commitment. Increased cultural diversity stemming from globalization significantly impacts the challenges associated with the IAD.

Two key elements of the IAD include (a) the unique information possessed by each team member and (b) the degree to which team members share this unique information. Team members usually possess unique information, but quite often, they assume their teammates already know this information. This assumption limits information sharing and is not likely to be different among team members from different cultural backgrounds. Team members with different cultural backgrounds, however, may have fundamentally different approaches to sharing their unique information. In cultures high on Hofstede's masculinity dimension, proactively sharing unique information is a common occurrence and would likely increase information sharing. Team members from cultures low on the masculinity dimension, however, might be less inclined to share such information, which would contribute to the prominence of the IAD. Again, the degree of cultural intelligence within a team will impact the extent to which this dilemma thwarts performance.

Teams high in cultural intelligence are more likely to understand the unique dynamics of their teammates' cultural backgrounds, thus facilitating performance. Let us consider the example of a student project team including team members from cultural backgrounds that are significantly different on the masculinity dimension. Culturally intelligent team members are more likely to know the cultural backgrounds of their teammates and how these differences might impact their teammates' communication styles. This information could be used to selectively engage team members from cultures low on masculinity in an effort to

encourage information sharing. Conversely, team members low in cultural intelligence will not be as aware of their teammates' cultural differences and will be less likely to formulate such communication strategies.

Culturally diverse teams are more likely to face communication challenges due to language barriers. Managers who maintain language standards while hiring team members often manage this issue during the selection process. Situations arise, however, where the primary criteria for selection revolve around technical proficiency and less attention is paid to communication ability. Situations of this ilk can result in significant communication challenges within teams and may reduce effectiveness. Communication barriers due to language differences are difficult to overcome in the short term and are most effectively managed during the hiring process. Cultural diversity affects the dynamics of interest asymmetry as well.

Interest Asymmetry Dilemma

Consider a top management team whose members are responsible for different parts of their organization (e.g., sales, operations, finance, etc.). While discussing methods for improving the company's financial performance, the team member responsible for sales suggests starting the manufacture of a new product as quickly as possible, while the team member responsible for manufacturing disagrees because she wants to move slowly in an effort to maintain quality and avoid costly liability claims. This is just one example of interest asymmetry: "[T]he degree to which team members have divergent interests in a given situation" (Edmondson et al., 2003, p. 303). It is not likely that cultural diversity will have a significant impact on this dilemma. The asymmetry of teammates' interests results from a variety of factors, primarily related to the internal dynamics of their particular organization as opposed to cultural differences.

Globalization has and will continue to increase the cultural diversity of work teams. Greater cultural diversity can have significant benefits for team viability and performance. Diversity, however, may also exacerbate some of the challenges or dilemmas associated with teamwork. It is essential that teams attempting to improve their effectiveness understand these dilemmas and how increasing levels of cultural diversity might affect them. In addition to cultural diversity, more teams will have to manage the reality of working virtually. The next section considers the increasingly common reality of virtual work environments. Again, this topic is examined in the context of the four fundamental dilemmas of teamwork.

VIRTUAL TEAMS

New communication tools and rapidly developing information technologies have created expanded opportunities for teams to work together across space and time (Kirkman et al., 2002). This, combined with heightened performance expectations and smaller budgets, has led to a significant increase in the implementation of virtual teams by organizations around the world. While the use of virtual teams is not new, it is expanding quickly and will continue to do so in the future. In fact, many traditional, colocated teams are doing more of their work virtually. The process of team members working together from disparate locations will occur with increased regularity, and those teams equipped to manage this reality will be much more effective.

"Virtual teams are defined as groups of employees with unique skills, situated in distant locations, whose members must collaborate using technology across space and time to accomplish important organizational tasks" (Kirkman, Rosen, Tesluk, & Gibson, 2004, p. 175). Organizations implementing virtual teams are able to bring team members together who may not otherwise be able to collaborate due to cost, time, and travel limitations. Other advantages of virtual teams include (a) organizations' ability to adapt more readily to sudden changes in team composition, (b) having team members close to relevant parts of the organization that are not colocated, and (c) helping organizations retain talented employees who may not be willing to relocate. Many virtual teams are implemented with the goal of improving performance and reducing associated costs. These goals, however, are not often realized. Some of the challenges facing virtual teams include (a) creating an environment of trust, (b) aligning team members around a singular purpose, (c) selecting virtual team members with sufficient technical and interpersonal skill, and (d) maximizing the process gains from working as a team. These challenges are not exclusive to virtual teams, but the lack of consistent face-to-face interaction exacerbates them. Next, teams working in virtual environments are considered within the context of the four fundamental dilemmas of teamwork.

Self-Interest Dilemma

The difficult choices team members are often forced to make between their own interests and those of the team are often made more challenging within a virtual work environment. This, however, will often be time dependent. Members of newly formed virtual teams spend a significant amount of time trying to figure out if they can trust their teammates. Colocated teams often form trust based on sharing meals, discussing personal matters, or socializing outside of work—often called interpersonal trust (Kirkman et al., 2002). The level of trust between members of virtual teams often grows via team member reliability, consistency, and responsiveness-often called task-based trust (Kirkman et al., 2002). The decision to place an individual priority above a team priority will often be easier during the formation stage because little trust has been established. Once a virtual team has been intact long enough to have established open and candid lines of communication and has developed

a high degree of trust, however, the self-interest dilemma can be mitigated because team members are committed to their teammates and the overall goals of the team.

Best practices for developing trust during the initial stages of virtual team development involve establishing norms of behavior for all team members. A high degree of responsiveness and consistency among team members is necessary to develop a trusting environment within which to operate. Team managers who emphasize these performance expectations will help their teams develop positive group norms. In addition, virtual teams that form team charters defining their purpose, deliverables, resources, time line, and the leader's role give themselves better odds (Nielsen et al., 2007) during the crucial early stages of team development.

Emotion Recognition Dilemma

As discussed earlier in this chapter, the ability for team members to recognize and manage their emotions can be a very valuable skill. Common sense might suggest, however, that virtual teams rely more on technical skill and would be less susceptible to the role of emotion considering they rarely, if ever, meet face-to-face. This is not the case. In fact, a large research study involving virtual teams from Sabre, Inc.—a high-tech company in the travel industry—found that the ability to recognize and manage emotions that contribute significantly to communication ability and interpersonal skill are vitally important for virtual team members (Kirkman et al., 2002). As one virtual team member from Sabre, Inc., put it, "Technical job skills are important, but I tend to look at their ability to be part of a team, how they adjust to working with others, and their people skills" (Kirkman et al., 2002, p. 74). A manager from the same organization commented,

It is not what the job is about. We can teach them the job. It is the right personality and the ability to get along with other team members. I don't care if they know 20 different kinds of software or not. I am more interested in how that person is going to fit into that team. (p. 74)

These comments seem to indicate that while technical ability is important, "softer skills" are more crucial for team member performance in a virtual context. This leads to the conclusion that virtual work environments will exacerbate the oft-faced teamwork dilemma involving the recognition of emotion.

Emotional intelligence will play an important role in a virtual team's ability to recognize and manage the role of emotion within a given team's context. Team members with higher levels of emotional intelligence will be better equipped to communicate effectively and leverage their increased interpersonal ability. These factors will contribute significantly to a virtual team's ability to develop a trusting environment, a fundamental ingredient for sustained success.

Information Asymmetry Dilemma

Virtual teams are able to communicate and share information in a multitude of ways such as electronic mail, video conference, text messaging, and phone calls. The majority of communication among virtual team members, however, takes place via electronic mail and phone calls. These communication mediums reduce the ability for team members to send and receive nonverbal information such as facial expressions and posture. Nonverbal information helps team members put communication in the proper context. Establishing this context is much more difficult when this information is absent. For example, one team member receives an e-mail from another and initially thinks her teammate is angry due to the terse message written in all capital letters. After meeting for coffee, she later discovers that her teammate was simply very excited about the topic being discussed. While phone calls offer more nonverbal information because participants can hear others' tone of voice, this medium still lacks important visual information provided by facial expressions and gestures. On average, members of virtual teams have less nonverbal information to determine the context of different communications they receive, increasing the probability that they will experience the information asymmetry dilemma. Similar to the ERD, the IAD is more likely in the early stages of a virtual team's development when team members do not know the subtleties of each other's communication patterns. Once teammates are familiar with each other's habits, they are better able to establish a context for the message and understand it more completely.

Virtual teams that establish a team charter improve their ability to manage the information asymmetry dilemma. Team charters proactively establish as much of a team's context as is possible before they begin operating as a true team. This, in turn, helps team members better understand the context of communications sent by teammates. Team charters also help establish expectations for team communication, which helps stabilize information sharing patterns. This typically helps teams reduce the potential deleterious impact of the IAD.

Interest Asymmetry Dilemma

Interest asymmetry is represented by the degree of divergent interests among team members (Edmondson et al., 2003). Teams working in a virtual environment are less likely to experience this dilemma, but they are more likely to have a difficult time overcoming this dilemma and moving forward. A variety of factors including organizational dynamics and individual differences motivate divergent interests among team members. These aspects are not directly impacted by working virtually. The extent to which working virtually slows the process of team members learning about each other, however, could limit the ability for a virtual team to overcome this dilemma. A key approach to man-

aging this dilemma involves the team manager or leader involving team members in the discussion of key issues but making the final decision on his or her own (Edmondson et al., 2003).

CONCLUSION

Teams work in an amazing array of environments and on a myriad of tasks. The proliferation of work teams seems very likely to expand in the future. While it is difficult to predict the future for teams, two current trends seem to dominate the landscape when looking forward: globalization and the virtual work environment. Organizations and their teams must consider these factors as they attempt to prepare for a rapidly changing future. While globalization and virtual work are two key facets of the future, teams have been challenged by four fundamental teamwork dilemmas for years. If teams want to succeed, these dilemmas need to be understood and actively managed within the context of increased diversity and virtuality. Organizations and teams that are prepared to do so increase their chances of successfully navigating the future and ensuring sustained effectiveness.

REFERENCES AND FURTHER READINGS

- Attaran, M., & Nguyen, T. T. (2000). Creating the right structural fit for self-directed teams. *Team Performance Management*, 6, 25–33.
- Bazerman, M., Mannix, E., & Thompson, L. (1988). Group negotiation: Effects of decision rule, agenda, and aspiration. *Journal of Personality & Social Psychology*, 54, 86–95.
- Borisoff, D., & Victor, D. A. (1998). *Conflict management: A communication skills approach*. Boston: Allyn & Bacon.
- Constanzo, C. (2004). B of A's six sigma teams begin work on integration with Fleet. *American Banker*, 169(47), 1–2.
- Daus, C. S., & Ashkanasy, N. M. (2005). The case for the ability-based model of emotional intelligence in organizational behavior. *Journal of Organizational Behavior*, 26, 453–466.
- DeMatteo, J. S., Eby, L. T., & Sundstrom, E. (1998). Teambased rewards: Current empirical evidence and directions for future research. *Research in Organizational Behavior*, 20, 141–183.
- Devine, D. J. (2002). A review and integration of classification systems relevant to teams in organizations. *Group Dynamics*, 6(4), 291–310.
- Edmondson, A. C. (1999). Psychological safety and learning behavior in work teams. *Administrative Science Quarterly*, 44(4), 350–383.
- Edmondson, A. C. (2003). Speaking up in the operating room: How team leaders promote learning in interdisciplinary action teams. *Journal of Management Studies*, 40(6), 1419–1452.
- Edmondson, A. C., Bohmer, R., & Pisano, G. (2001). Disrupted routines: Team learning and new technology implementation in hospitals. *Administrative Science Quarterly*, 46(4), 685–716.

- Edmondson, A. C., Roberto, M. A., & Watkins, M. D. (2003). A dynamic model of top management team effectiveness: Managing unstructured task streams. *Leadership Quarterly*, 14, 297–325.
- Feldman, D. C. (1984). The development and enforcement of group norms. *Academy of Management Review*, 9(1), 47–53.
- Guzzo, R. A. & Shea, G. P. (1992). Group performance and intergroup relations in organizations. In M. D. Dunnette & L. M. Hough (Eds.), *Handbook of industrial and organizational psychology* (2nd ed., Vol. 3, pp. 269–313). Palo Alto, CA: Consulting Psychologists Press.
- Hackman, J. R. (1987). The design of work teams. In J. Lorsch (Ed.), *Handbook of organizational behavior* (pp. 315–342). New York: Prentice-Hall.
- Hackman, J. R. (1990). Groups that work (and those that don't): Creating conditions for effective teamwork. San Francisco: Jossey-Bass.
- Hackman, J. R. (2002). *Leading teams: Setting the stage for great performances*. Boston: Harvard Business School Press.
- Hackman, J. R., & Morris, C. G. (1975). Group tasks, group interaction process, and group performance effectiveness: A review and proposed integration. In L. Berkowitz (Ed.), Advances in experimental social psychology (Vol. 8, pp. 45–99). New York: Academic Press.
- Halfhill, T., & Huff, J. (2004). Defining group viability. Roundtable presented at the 19th annual meeting of the Society for Industrial and Organizational Psychology, Chicago.
- Hitt, M. A., Bierman, L., Uhlenbruck, K., & Shimizu, K. (2006). The importance of resources in the internationalization of professional service firms: The good, the bad, and the ugly. *Academy of Management Journal*, 49(6), 1137–1157.
- Hofstede, G. (2001). *Culture's consequences: Comparing values, behaviors, institutions, and organizations across nations* (2nd ed.). Thousand Oaks, CA: Sage.
- Homans, G. C. (1950). The human group. New York: Harcourt.
- Jordan, P. J., Ashkanasy, N. M., Hartel, C. E. J., & Hooper, G. S. (2002). Workgroup emotional intelligence: Scale development and relationship to team process effectiveness and goal focus. *Human Resource Management Review*, 12(2), 195–214.
- Jordan, P. J., & Troth, A. C. (2004). Managing emotions during team problem solving: Emotional intelligence and conflict resolution. *Human Performance*, 17, 195–218.
- Kerr, S. (1975). On the folly of rewarding A, while hoping for B. Academy of Management Journal, 18, 769–783.
- Kirkman, B. L., Rosen, B., Gibson, C. B., Tesluk, P. E., & McPherson, S. O. (2002). Five challenges to virtual team success: Lessons from Sabre, Inc. Academy of Management Executive, 16(3), 63–79.
- Kirkman, B. L., Rosen, B., Tesluk, P. E., & Gibson, C. B. (2004). The impact of team empowerment on virtual team performance: The moderating role of face-to-face interaction. *Academy of Management Journal*, 47(2), 175–192.
- Kozlowski, S. W. J., & Ilgen, D. R. (2006). Enhancing the effectiveness of work groups and teams. *Psychological Science in the Public Interest*, 7(3), 77–124.
- Kramer, P. D. (1989). Moments of engagement: Intimate psychotherapy in a technological age. New York: Viking.
- Lawler, E. E. (1990). Strategic pay. San Francisco: Jossey-Bass.

- Lawler, E. E. (1999). Creating effective pay systems for teams. In E. Sundstrom (Ed.), *Supporting work team effectiveness* (pp. 188–212). San Francisco: Jossey-Bass.
- Maultsby, M. C. (1986). *Coping better, anytime, anywhere: The new handbook of rational self counseling.* Bloomington, IN: Rational Self Help Books.
- Mayer, J. D., Salovey, P., & Caruso, D. R. (2000). Emotional intelligence: Theory, findings, and implications. *Psychological Inquiry*, 15(3), 197–215.
- McGrath, J. E. (1964). *Social psychology: A brief introduction*. New York: Holt, Rinehart, and Winston.
- McGrath, J. E., & Altman, I. (1966). *Small group research: A synthesis and critique of the field.* New York: Holt, Rinehart & Winston.
- Nielsen, T. M., Edmondson, A. C., & Sundstrom, E. (2007). Team wisdom: Definition, dynamics, and applications. In E. Kessler & J. Bailey (Eds.), *Handbook of organizational and managerial wisdom* (pp. 21–42). Thousand Oaks, CA: Sage.
- Nielsen, T. M., & Halfhill, T. (2006). A strategic contingency model of team leadership. In C. Cooper (Ed.), *Inspiring lead*ers (pp. 191–211). London: Taylor and Francis.
- Nielsen, T. M., Halfhill, T., & Nielsen, S. K. (2005). Prosocial behavior and performance at three levels of analysis: An integrative model. In D. Turnipseed (Ed.), Handbook of organizational citizenship behavior: A review of 'good soldier' activity in organizations. Hauppauge, NY: Nova Science Publishers.
- Perkins, A. L., & Abramis, D. J. (1990). Midwest Federal Correctional Institution. In J. R. Hackman (Ed.), *Groups that work (and those that don't): Creating conditions for effective teamwork* (pp. 309–329). San Francisco: Jossey-Bass.
- Pfeffer, J. (1992). *Managing with power*. Boston: Harvard Business School Press.
- Roethlisberger, F. J., & Dickson, W. J. (1939). *Management and the worker*. Cambridge, MA: Harvard University Press.
- Salancik, G. R., & Pfeffer, J. (1974). The bases and use of power in organizational decision making: The case of a university. *Administrative Science Quarterly*, 19(4), 453–473.
- Schuster, J. R., & Zingheim, P. K. (1992). *The new pay*. San Francisco: Jossey-Bass.
- Seashore, S. E. (1954). *Group cohesiveness in the industrial work group*. Ann Arbor, MI: Institute for Social Research.
- Simmons, J. C. (December, 2004). Buying time, saving lives: Hospital rapid response teams find ways to reduce mortality outside the ICU. *The Quality Letter for Healthcare Leaders*, 16(12).
- Snyder, B. (2003, May). Teams that span time zones face new work rules. *Stanford Business Magazine*, 2. Retrieved August 31, 2007, from http://www.gsb.stanford.edu/news/bmag/sbsm0305/feature_virtual_teams.shtml
- Stevens, M. J., & Campion, M. A. (1994). The knowledge, skill, and ability requirements for teamwork: Implications for human resource management. *Journal of Management*, 20(2), 503–530.
- Sundstrom, E., DeMeuse, K. P., & Futrell, D. (1990). Work teams: Applications and effectiveness. *American Psychologist*, 45, 120–133.
- Sundstrom, E., McIntyre, M., Halfhill, T. R., & Richards, H. (2000). Work groups: From the Hawthorne studies to work teams of the 1990s and beyond. *Group Dynamics*, 4, 44–67.

- Sutton, R. I., & Hargadon, A. (1996). Brainstorming groups in context: Effectiveness in a product design firm. *Administrative Science Quarterly*, *41*, 685–718.
- Torrence, E. P. (1954). Some consequences of power differences on decisions in B-26 crews (Research Bulletin #AFPTRC-TR-54—128). San Antonio, TX: Lackland Air Force Base, Air Force Personnel and Training Research Center.
- Van Dyne, L., Ang, S., & Nielsen, T. M. (2007). Cultural intelligence. In S. Clegg & J. Bailey (Eds.), *International encyclopedia of organization studies* (Vol. 1, pp. 345–350). Thousand Oaks, CA: Sage.
- Walker, C. R., & Guest, R. H. (1952). *The man on the assembly line*. Cambridge, MA: Harvard University Press.

Collaborative Innovation

Web-Based Tools for Customer
Involvement in New Product Development

Gianmario Verona and Emanuela Prandelli Bocconi University

ustomer involvement in new product development has recently become a major issue in management literature. Underlying all innovation activities is the particular attention progressively being focused on regarding consumers as partners in the learning process, even discriminating between the contribution made by advanced users and ordinary users compared to professional developers. Companies have new opportunities to improve their innovation processes by applying the knowledge and competence of their own customers rather than just accumulating knowledge about them through traditional marketing research. Companies can thus create value by working with their own customers rather than just working for them. This mutual collaboration allows a company to improve its external fit by reinforcing its competitive edge, since it can better anticipate market changes and satisfy not only its customers' desires but also their potential needs. To this end, interacting and collaborating with the lead users has proven useful, as have the market experiments designed to support learning from mistakes and the techniques based on soliciting metaphors and mental models underlying specific consumer attitudes and behavior. The most advanced application of these techniques allows the company to directly involve the customer in his or her new product development processes according to a participatory approach. Customers have proven to be an especially precious source of new solutions for different product categories, ranging from sportswear to mechanical equipment. The application of this greater customer knowledge enhances the innovation process and makes it possible to better satisfy market needs. However, this goal is difficult to achieve as absorbing customer knowledge is a complex matter from an organizational standpoint and costly from an economic one.

Recent contributions from literature show how Webbased tools can simplify these activities by making it easier to manage systematic interactions with a select group of customers at a low cost. The Web and, in general, the tools based on ICT enhance, in a remarkable way, the company's capacity to conveniently absorb market knowledge and regularly interact with a category of consumers that is broader than the regular customer base. This would clearly be impossible offline and represents the revolutionary potential of the Web to support the development of product innovation managed by individual companies. To be more specific, different Web-based tools have been developed over time to support each stage of the innovation process.

The purpose of this chapter is to examine the practices of firms that intensively use the Web to cooperate with their customers across their innovation processes, by addressing two questions: (a) What are the properties of virtual environments enabling collaborative innovation? (b) How can firms involve customers through the Web in different new product development activities? To answer these questions, the remainder of the chapter is structured as follows. We provide an overview of the literature in which we discuss various conceptualizations of customer knowledge and customer involvement in the firm's innovation processes. Then we highlight key patterns in technology marketing that enhance direct collaboration with individual customers and communities of customers. We finally use the review to develop our collaborative innovation conceptual framework, providing a comprehensive picture about the tools enabled by the latest ICT developments to support new product development, following the seminal contribution by Dahan and Hauser (2002). The last part of this chapter points out the limitations of the analysis, the implications for management, and the future directions for research.

THE RELEVANCE OF CUSTOMER INVOLVEMENT IN INNOVATION ACTIVITIES

Collaboration has become an established way of doing business with suppliers, channel partners, and complementors (those whose products are made more valuable by yours). However, with a few notable exceptions, working directly with customers to cocreate value remains a radical notion. As consumers have become increasingly empowered and demanding, marketing scholars have preached the benefits of customer-relationship management—essentially an "inside-out" approach to retaining customers based on the misguided notion that the company is the arbiter of the relationship and the customer plays a passive role. In today's connected world, however, collaborative innovation—the valuable process of partnering with the end user to create and maximize value—is the real goal.

Actually, firms have always sought to build deeper customer connections to make their innovation process more effective. Several contributions highlight different stages in the evolution of the relationship between a firm and its customers in the context of supporting and catalyzing new product development activities.

At the simplest level of the firm-customer interaction, customers play the role of passive receptors of the firm's innovation activities. The key idea at this stage is to improve the fit between the firm's offerings and customers' needs by surveying customers and importing customer understanding into the firm. Firms need to listen to their customers by developing a market orientation, because market knowl-

edge plays a strategic role in supporting their competitive advantage, improving new product development processes. Market-sensing ability and internal organization are seen as key factors driving innovation success, along with effective research and development (R&D) and manufacturing routines. Firms try to understand the expressed desire of their customers, called the "voice of the customer," usually through focus groups, customer surveys, and research techniques such as concept testing and conjoint analysis. According to this perspective, the firm-customer relationship tends to be a one-way import of explicit knowledge from individual customers who are already included in the company's customer base. Actually, customer knowledge plays a broader role in innovation and customer-knowledge absorption activities can be extended across three different dimensions.

From Explicit Customer Knowledge to Tacit Customer Knowledge

When customers are viewed as passive recipients of the company's value proposition, the firm cannot fully understand customer knowledge assets developed within their specific contexts of experience. At the next level, firms have attempted to involve customers more deeply in their marketing process, by developing two-way learning relationships with individual customers. More specifically, the research in the service-marketing field proved that customers can play the role of partial employees. Such two-way learning relationships enable the firm to create customized offerings for specific target segments, greatly increasing their satisfaction. To support this two-way process, the firm's research toolkit has to expand dramatically to include newer techniques aimed at discovering unarticulated needs through direct customer observation and interaction. For example, firms can observe customers within their native surroundings; dialogue and work closely with lead users; conduct market experiments by using a "probe-and-learn" process; and adopt techniques designed to uncover unarticulated, perhaps even unconscious, preferences by employing the metaphors, constructs, and mental models driving customer thinking and behavior. Pushing such approaches a step further, firms can involve customers directly in their product design process. Techniques based on participatory design and emphatic design (Leonard & Rayport, 1997) enable customers to directly contribute to new product development. In summary, one-way knowledge import evolves into a richer dialogue with individual customers, allowing firms to tap into the deep and rich store of tacit customer knowledge.

From Individual Customer Knowledge to Social Customer Knowledge

Following the approach just mentioned, however, an important dimension of customer knowledge is still untapped.

This is the social knowledge that develops through the interactions that customers have with each other to develop a social identity and recognize themselves as members of specific social categories on a contextual basis. It is a crucial dimension of customer knowledge in order to improve the firm's marketing activities, particularly in industries characterized by rapid and uncertain changes in customer preferences. Recently, a new awareness about the relevance of social knowledge has emerged. Some authors have introduced the notion of *community* (Wenger, 1998) to describe the social and emotional phenomena in consumption. These authors suggest that customers choose specific products considering not only their usage value, but also their linkage value—that is, their potential for stating customer identification with a specific social group. Hence, any consumption experience needs to be analyzed within a social context in order to be deeply understood. The techniques that have been most commonly employed to analyze the influence of the social dimension on consumption behavior range from the traditional workshop based on focus groups, where the main challenge is dealing with group-thinking phenomena, to anthropology and ethnography with its emphasis on cool hunting. Especially in the latter case, the main idea is that people within a culture have procedures for making sense. Hence, the key object of the analysis is the bundle of verbal and behavioral mechanisms through which a specific group of customers builds social meaning. Participant observation—that is, observation of customer activities directly sharing their experiences on real time—is the most popular method for this purpose. Techniques based on role-playing have been effectively used as well in order to grasp tacit knowledge emerging at a collective level.

From Core Customer Knowledge to Peripheral Customer Knowledge

Firms can also benefit from intermediaries or knowledge brokers who collect customer-generated knowledge from a broader set of contexts and from different vantage points (Hargadon & Sutton, 2000). Through direct channels of communication, companies may not be able to reach the right customers, because their interactions and perspectives tend to be limited to the markets they already serve. Companies can also find it difficult to reach people at the right time, because customers tend to interact with them at relatively late stages of the decision-making process. Knowledge brokers can connect with a broader base of customers than the firm's own customers in contexts that are very different from the narrow context of product purchasing, and in domains that extend beyond the firm's immediate product and service offerings. Therefore, they help individual firms to listen to more diverse and unusual voices, accessing customer knowledge that is not only both individual and social, explicit and tacit, but also not constrained by the firm's mental models or biases. By improving the "peripheral vision" of firms, these mediators help firms to escape from the bias of their served markets and their core customer knowledge (Verona, Prandelli, & Sawhney, 2006).

THE ROLE OF THE WEB IN SUPPORTING COLLABORATIVE INNOVATION WITH CUSTOMERS

The Web presents several unique properties that not only make customer knowledge absorption easier and cheaper, but also allow customers to become actively involved in the firm's innovation activities. Specifically, Web-based tools can simplify the activities of customer-knowledge absorption by making it easier to manage systematic interactions with a select group of customers, even broader than regular customers, at a low cost. The Web enables the creation of virtual customer environments—platforms for collaboration that allow firms to tap into customer knowledge through an ongoing dialogue (Nambisan, 2002).

Specifically, it allows for a continuous and rich dialogue with a huge number of customers at a very low cost (Evans & Wurster, 1999). Therefore, it makes the one-way customer knowledge import and dialogue with individual customers more efficient and effective. The Web also vastly augments the firm's capacity to tap into the social dimension of customer knowledge, by enabling the creation of virtual communities of consumption to collect and analyze knowledge that develops through spontaneous conversations among customers. Customers self-select themselves based on the focused interests promoted by specific communities. This self-selection means that customers are highly involved and motivated to share knowledge with other customers and community managers, making their contribution both richer and less expensive than in the off-line world. Finally, on the Web there are increasing opportunities to access a partner's partner competencies, as well as a customer's customer knowledge, entering electronic archives and virtual communities. Hence, peripheral knowledge can be more easily grasped, especially by independent third parties who act as knowledge brokers by filling structural holes between individual customers and communities of customers on one side and specific firms on the other side (Sawhney, Prandelli, & Verona, 2003).

A description of the unique characteristics of the Webenhancing customer-knowledge absorption and supporting customer involvement follows.

Reach: Allowing Firms to Reach Beyond Current Customers, Markets, and Geography

First, the Internet is an open, cost-effective, and easy-to-use network compared to previous proprietary networks—such as EDI. These properties make it a global medium with unprecedented reach, substantially increasing the number of relationships that an individual player can

manage without geographic constraints. In this way, new information technologies facilitate extended connectivity to leverage distributed competencies.

Interactivity: Permitting True Collaborative Work Instead of Merely "Knowledge Import"

Virtual environments break the age-old trade-off between richness and reach (Evans & Wurster, 1999). In the physical world, communicating (and absorbing) rich information requires physical proximity or dedicated channels, while sharing information with a large audience requires compromises in the quality of information. Therefore, the number and the quality of relationships that any player can develop in the physical world is limited by this reach-richness tradeoff. In virtual environments, it is possible to go beyond this tradeoff and create two-way relationships with a large number of players without compromising on the richness of the same relationships. On the Web, companies can richly interact with a huge number of customers on a systematic basis, in this way supporting true collaboration.

Scalability: Allowing Firms to Connect With Thousands of Customers

Positive network externalities create incentives to extend the number of connections enacted by the individual player. On the supply side, the incremental cost to reach any new customer progressively tends to decrease because of the predominance of fixed cost compared to variable costs. On the other side of the network, consumers find more value in a network as the number of users of the network increases. According to the so-called Metcalfe's law, the value of a network increases in proportion to the square of the number of people using it. So the first competitor to achieve a critical mass of customers can potentially achieve dominance. Consequently, when a company has reached the critical mass of connections, dominance tends to increase further in a virtuous cycle. Of course, the threshold level has a limit up to which the value of the network may slope downward because of the negative effects of a very large network—which include saturation, contamination, and cacophony. Still, the threshold level of a virtual network is far greater than the one of a physical network.

Persistence: Persistent Ongoing Engagement Instead of Episodic Interactions

Virtual environments push industries to become more global. Boundaries between industries tend to blur on the Web and, at the same time, the division of innovative labor tends to develop across geographies. The joint effect is that it is much less likely to find all the competences needed to support innovation within the same organization. The Web can be used to coordinate activities and information sharing between otherwise disconnected pools of knowledge

and competences on a systematic and global basis at a lower cost than in traditional, off-line environments. Hence, virtual environments create the need for engaging an increasing number of players on a systematic basis (because of more diverse competencies needed) and at the same time provide the solution (thanks to low-cost coordination mechanisms and opportunities for sharing the innovative labor on a global and continuous basis).

Speed: Reduced Latency in the "Senseand-Respond" Cycle—Real-Time Results

The Web has a powerful effect in increasing the flexibility of the network, allowing not only to involve different partners at different times, but also to transform weak relations in strong relations and vice versa, depending on the complexity of the knowledge that needs to be transferred. Real time, two-way, and low-cost communication makes it easy to consolidate specific customer relationships on a contingent basis through ad hoc virtual communities and online conversations. Consequently, the individual player can benefit from high plasticity in the organization of his or her connections with different actors on a very dynamic basis and with low costs of conversion, once the platform of interaction has been created.

Peer-to-Peer: Allowing Access to Customer-Generated Social Knowledge

The Web also vastly augments the firm's capacity to tap into the social dimension of customer knowledge by enabling the creation of virtual communities of consumption to collect and analyze knowledge that develops through spontaneous conversations among customers. Customers self-select themselves based on the focused interests promoted by specific communities. This self-selection means that customers are highly involved and motivated to share knowledge with other customers and community managers, making their contribution both richer and less expensive than in the off-line world. As we said, any consumption experience needs to be analyzed within a social context in order to be deeply understood, and the phenomenon of word-of-mouth epitomizes it. However, when companies are offline, except for focus groups no tools are available to make emerging social customer knowledge. Online, virtual communities allow the systematic leverage of social customer knowledge, for the first time monitoring word-ofmouse (i.e., word-of-mouth through the mouse) phenomena. Beyond the opportunity to leverage direct connections with communities of customers, it is also relevant not to forget that the Web is a low-cost open standard: Anyone anywhere can connect to it and contribute to the public discussion. This makes it much easier to access a partner's partner competencies, as well as a customer's customer knowledge, entering electronic archives and virtual communities managed by independent third parties.

Web-Based Customer Knowledge Absorption at Each Stage of the Innovation Process: A Conceptual Framework

We propose that the previously mentioned unique characteristics of the Web allow the firm to evolve from a perspective centered on interaction with customers to a perspective focused on active collaboration with customers intended as partners at each stage of the value creation process (Prandelli, Verona, & Raccagni, 2006). The differences between the former and the latter are quite relevant. In the first case, the interaction is the locus of economic value extraction and markets are considered as forums for value exchange. The main competitive issue for the individual firm relies on better understanding customers in order to create a superior value proposition for them. On the contrary, when we move toward a perspective centered on firm-customer collaboration, the interaction becomes the locus of cocreation of value and value extraction and markets are forums for cocreation of experiences (Prahalad & Ramaswamy, 2004). The main competitive issue for the firm is to create value propositions with its customers: The firm and its customer collaborate in cocreating value and then compete in extracting value.

Virtual environments can leverage two main drivers in enhancing opportunities for collaborative marketing and innovation. First, the Web empowers customers across all marketing activities. In virtual environments, customers have the opportunity to define what information they want, what product they are interested in, and hence they have the chance to increase their control over any exchange process, pushing companies to change their information policies in dealing with them from opaqueness to transparency (Sawhney & Kotler, 2001). The balance of power between the company and the customer shifts toward equilibrium and the boundaries between them are blurring. Specifically, customers have the possibility to self-inform as they can research products and issues on their own without relying on experts (as in the medical Web sites WebMD.com and MedlinePlus.com). According to the "Internet efficiency view," in digital environments where product information is separated from the physical product, customers are fully informed about process and all available alternatives, reducing opportunities of profit for retailers. Hence, they can self-compare product features and prices side by side from competing manufacturers with a few clicks of a mouse (as in PriceGrabber.com and DealTime.com). Customers can also monitor manufacturers' reputations to assure themselves of product and service quality, enacting a sort of self-police approach (consider, for instance, eBay.com and BizRate.com). Finally, they can self-organize, creating or joining communities of interest or conducting conversations on products, interests, lifestyles, or issues to share their experiences (e.g., iVillage.com, Experts-Exchange. com), and self-advice, providing feedback for their peers based on the basis of their experiences with products and

manufacturers (e.g., Amazon.com, PlanetFeedback.com, Epinions.com, and Ciao.com).

However, the most radical novelty in firm-customer relationships introduced by the Web is not related to customer empowerment, but to direct customer involvement into marketing and especially innovation activities through ad hoc virtual interfaces (Sawhney, Verona, & Prandelli, 2005). This is the second driver of collaboration with customers in digital environments. In fact, the Web allows customer involvement across all innovation activities. In particular, digital environments are extraordinarily powerful in supporting direct involvement of consumers throughout the entire innovation process because a segmented public can be efficiently and rapidly reached. The cost of developing and testing virtual prototypes is much lower than physical prototypes and virtual reality can significantly enhance the quality of the interaction with the consumers and the process of distributed learning. Hence, an approach based on the systematic, direct interaction with the customer is becoming increasingly relevant in new product development. We subsequently describe the most significant Web-based applications at each stage of the innovation process and provide examples.

Idea Generation

The first stage of new product development greatly benefits from the Web's potential to integrate and enhance consumer input. The simplest application consists of online questionnaires. In the search for successful new product ideas, the aim is to reduce uncertainty by identifying customers' preferences and interacting directly with them to absorb various potential stimuli that could open up new paths (Dahan & Hauser, 2002). The questionnaire usually aims to improve selected aspects of the site, product, or service; financial incentives considerably increase the response-rate. To enhance customer involvement through the Web during the idea-generation stage, companies can also use suggestion boxes where users can express their own innovative ideas. A good example is the Ben & Jerry site, where users can contribute new ideas for both products (prepackaged ice cream) and services (especially packaging and distribution) in a dedicated area of Customer Assistance. Advanced applications of these dialogue windows are also found on the Procter & Gamble site (www.pg.com) for a large number of product categories. In all these cases, it is essential to establish clear regulations regarding intellectual property rights, so that the company can use the innovative ideas suggested by consumers who are also encouraged through product or financial incentives. Even reward mechanisms can be introduced to encourage the most competent users to compete with each other in finding new ideas to solve specific company problems. Remuneration is usually paid by the company and, in some cases, can even exceed \$100,000 as in the Innocentive.com site created by Eli Lilly. Thanks to a spin-off, the site today provides reward mechanisms for the generation of new concepts in several industries, ranging from plastics to mass-market consumer goods.

It is also easier to handle complaints online both for the company interested in improving its supply and for dissatisfied users. In the more advanced cases, users are given a range of specific e-mail addresses where they can send their complaints and ask for explanations. Accurate analysis of the complaints serves to stimulate and strengthen existing products and can even lead to the introduction of radical changes. Particularly useful is also the technique of "listening in" (Urban & Hauser, 2004), namely, recording and analyzing the information exchanged between individual users and the experts who provide virtual advice to help them identify the product that best satisfies their needs. The "virtual consultant" tries to identify the respondent's ideal product while the designer can understand the product features least satisfying to the customer and subsequently question the customer in order to understand how to best answer his or her unmet needs.

Finally, new product and service generation can also considerably benefit from online virtual communities of customers, which bring together users sharing the same interests and willing to promote spontaneous online conversations to exchange opinions and experiences. As we anticipated, by encouraging direct and iterative communication in the online community, these groups generate knowledge regarding consumption shared at the social level, which is difficult to grasp using other research tools. Intangible incentives, often associated to opinion leadership, usually represent a good way to stimulate participation in communities emerging in consumer markets, while economic incentives are more common in business communities (Sawhney & Prandelli, 2000). In both cases, spontaneous members usually show a high degree of involvement and often even offer—as in the case of the communities of videogame (cf. Idsoftware.com), motorcycle (cf. Ducati.com) and software (cf. Sunmicrosystems.com) enthusiasts—specific technical competence, rendering their contribution particularly qualified and trustworthy.

Idea Selection

Idea selection represents a critical stage in new product development to preserve economic balance. To this end, the most important Web-based tools include virtual concept testing and online focus groups. In the first case, virtual reality gives innovative companies the opportunity to develop different product concepts in great detail thus allowing consumers to compare individual product features and select the most convincing concept. For instance, Volvo has created an ad hoc site—Conceptlabvolvo.com—where users can express their preference for new automobile concepts proposed by the company, those they consider the most appealing and most likely to succeed and be manufactured. Users can also view the evaluations expressed by other consumers in real time. If the cost of transforming

the product concept into a prototype is low—as in virtual environments—it is opportune to move the selection stage as far up as possible in the innovation process. This makes it possible to also increase response flexibility and possible changes in market and technology thereby reducing product development time, promoting the processes of learning from low-cost mistakes, and preventing the information collected at the beginning of the product development cycle from becoming outdated (Eisenhardt & Tabrizi, 1995).

The second key tool used to promote the Web-based concept selection process is the online focus group. This is the traditional research technique based on knowledge of the market through consumer interaction, made much more efficient and applicable to a select group of a difficultto-reach public organized by the Internet. It is based on videoconference technology and chat rooms. Consumers are identified according to their specific characteristics and asked to form virtual teams to discuss and evaluate different product concepts. A particularly important aspect of the online focus groups is the anonymity the Internet provides. Although on the one hand this results in less emotional involvement, on the other hand the participants are considerably less inhibited and group-thinking phenomena, where the individual contributions merely reflect the views of the dominant member of the group, are less common.

The so-called "Information Pump" (Prelec, 2000) is based on virtual focus groups where participants are asked to express their opinions about new product concepts in order to identify the most successful ones. The aim is to make an objective evaluation of the quality and internal coherence of the participants' opinions, which are evaluated each time by an impartial expert and by the other participants. In order to ensure this method functions efficiently, all information must be updated in real time and an appropriate system of incentives implemented for the participants. This method is particularly useful, since it makes it possible to not only objectively classify the opinions of individual participants regarding new product concepts, but also to evaluate the quality and reliability of each respondent.

Product Design

Once product concepts have been identified, they have to be organized in product configurations that can be subsequently tested on the market before they are launched. At this point, the key problem is to transform consumer priorities into design and engineering priorities by directly involving the customer in identifying specific product features subsequently incorporated into the final product. Such a codefinition of the product's features in virtual environments can range from simply applying mass-customization tools to combine aesthetic and functional product features conceived in modular form, to developing cross-functional design teams that involve customers directly through the Web, to the complete product design by the customer himor herself.

First, as suggested by Dahan and Hauser (2002), consumers can be asked to select different product attributes of new product concepts by applying Web-based tools of conjoint analysis. By using virtual interfaces that the respondents enjoy navigating and that are relatively easy for the company to implement, it becomes possible to determine the main features respondents prefer, the attributes that interact, and the ideal combination. As the authors argue, this method has been successfully applied to develop a wide range of products from cameras and photocopiers to toys and detergents.

The most advanced applications of Web-based conjoint analysis have led to the mass customization of products designed and sold through the Web such as the Barbie dolls offered online by Mattel and the sneakers that can be purchased on the Nike site. Consumers seem to especially like the interface images that allow them to view the different product attributes and then combine them to create their ideal product configuration with a mere click of the mouse. Moreover, the respondents tend to create their products according to whether they are asked to add attributes to a basic model or eliminate undesirable ones from the most complete configuration. This obviously has key implications for the design and internal organization of the site.

Although the possibility of customizing the aesthetic and functional components of the supply represents an option that involves the customer in product development based on an accurate analysis of the "cards" selected, that is, on the optimization of the processes of absorbing knowledge "about" the consumer, more radical options are offered by the Web to enhance the knowledge and competence "of" the consumer. More specifically, by allowing consumers to become involved in a wide range of activities, from making minor modifications to existing products to creating radically innovative modifications, digital environments allow consumers to even design and develop new products (Thomke & von Hippel, 2002). Toolkits for user innovation can be assembled to exploit new technologies such as computer simulation in order to make new product development faster and less costly. These toolkits are merely coordinated sets of user-friendly tools for the configuration of new products that allow users to self-develop innovations. This eliminates the problems of sharing customer knowledge that is often sticky since it is idiosyncratic and context specific and therefore difficult to transfer (von Hippel, 1994). These tools usually support specific projects, requiring ad hoc competence in a specific product category. Within this area, the user is free to innovate, develop customized products through mechanisms of repeated trial and error and even suggest new patents for the finished product. In this way, the user can create a preliminary design, simulate its development and prototyping, evaluate how the product will function when used, and proceed to systematically improve it until he or she is satisfied with the final version. Prototyping and rapid experimentation are crucial in supporting this approach, which can systematically integrate

the competence and experience of the consumer in the innovation process. A broad range of industries has begun to introduce these applications. For instance, in the software industry, it has been widely demonstrated that it is useful to promote consumer involvement in the codefinition of products by allowing users to download beta versions and asking them to identify possible bugs. Customer-driven, Web-based toolkits to support innovation processes have also been successfully developed in the industries of computer circuits, plastics, and consumer goods (Thomke & von Hippel, 2002).

User design mechanisms can also be applied by ad hoc virtual cross-functional teams created by companies rather than by the larger virtual communities of product users (Sawhney & Prandelli, 2000). In the first case, the consumers are considered real partners in the innovation process coordinated by the company, and they are encouraged to collaborate in specific projects. After undergoing a careful selection process and offering appropriate incentives—often based on award mechanisms and/or contests-consumers are involved in distance work teams and collaborate with other division members chosen from the Marketing, research and development (R&D) and production divisions. Networking systems and groupware technologies are crucial and support consumer knowledge-sharing within the organization and its integration with preexisting knowledge. The result is a rather systemic collaboration that goes far beyond knowledge transfer.

In the case of the application of user design tools to virtual user communities, customer input in the innovation processes is mainly based on open-source mechanisms. Such mechanisms support communities that are completely run by and for the users and allow them to exchange opinions on specific products. While these products are initially mainly technical, they can lead to direct collaboration in the creation of new products and services (von Hippel, 2001). In these systems, each user does not necessarily develop the needed product or service alone—as in the individual application of the toolkits for user innovation—but can benefit from the innovative suggestions freely made by the other users. In the typical case of software products, this means that each user can obtain a copy free of charge and can legally study its source code, modify, and distribute it to others without any remuneration. Many studies show that these mechanisms are particularly useful in developing innovations related to the software industry and the Internet start-ups. In fact, open-source mechanisms have expanded into many different industries (for instance, sportswear) where systematic new product development is essential (von Hippel, 2001). Regardless of the specific industry considered, the reason these kinds of distributed innovation mechanisms are so successful is that they enhance the reputation of each user who concretely contributes to the final output and promote a reciprocal relationship in the creation of the final product. Moreover, the sense of responsibility toward the group, and the awareness of the significant impact on the community often represent important stimuli to those who are qualified and want to participate.

Product Testing

Digital environments can significantly contribute to simplifying and making the new product testing stage more efficient before launching a product on the market. New technologies such as rapid prototyping, simulation, and combinatorial methods make it possible to generate and test different product versions. Web-based tools further enhance this approach by exploiting the potential of virtual-reality, three-dimensional images, and animation to generate lowcost virtual prototypes that are fairly close to the quality and completeness of the physical one (Dahan & Srinivasan, 2000). The Web thus makes it possible to simultaneously test different product configurations (virtual product testing) as well as different market situations; that is different marketing mixes to complement the supply (virtual market testing) in order to choose the best solution with the direct collaboration of the end users.

Regarding virtual product testing, the best opportunities stem from the application of the Virtual Reality Markup Language. This tool is a three-dimensional virtual representation of the product that, when combined with streaming video and interactive sensory peripherals, allows visual, auditory, and tactile information to be effectively distributed to end users. Consumers can view detailed descriptions of each prototype combined with virtual tours around and inside the product. In this way, all the product components can be seen before consumers make their final evaluation. Like the stage when consumers can choose different product concepts, even in this case, consumers can modify, at least in part, some product features by choosing some predefined modular attributes in order to identify the price-attribute combination that best satisfies their individual need.

This application can also be used to integrate the virtual representation of the product through the reproduction of the other attributes of the marketing mix—from advertising to the representation of the sales force—in order to recreate a total virtual shopping experience. This method, aimed at supporting the market forecast of each product, is also defined as information acceleration. Like the evaluation of an electric vehicle prototype proposed by Urban, Weinberg, and Hauser (1996), each user cannot only virtually "enter" the car, but can also exchange information with other users, interact with the car dealer, view advertising material, and so on. It is clear that the amount of processed information required to reproduce a real simulation of the purchasing experience tends to be much greater compared to simple virtual product testing and the number of tested prototypes tends, as a consequence, to decrease.

Finally, it is worth noticing that in both cases conjoint analysis makes it possible to make reliable estimates of the future market share of each prototype. As Dahan and Srinivasan demonstrate (2000) in the product category of

the bicycle pump, the results obtained from virtual product testing are extremely precise, can be carried out at a much lower cost, and are rather similar to those obtained through physical product testing. This means that this approach can also be used for a variety of durable goods.

Product Launch

The role of the consumer in the innovation process, however, does not end with the development of the product. On the contrary, online activities such as viral marketing or Web-enabled word of mouth become strategic tools that can effectively promote rather than hinder even the final product launch stage. Companies can usually promote viral marketing by introducing options such as the possibility to send a specific Web page "to a friend." Due to the reliability of the information source, these "electronic postcards" can enhance product exposure at a very low cost and enhance product trust. Ad hoc incentives—such as discount coupons, free samples, or participation in contests—can be offered to both the senders and the recipients of viral messages in order to effectively support "word-of-mouse" activities.

This phenomenon can also be enhanced by virtual communities. Although customer knowledge-sharing within a community is less organized and controlled, it is extremely effective, since it is based on a spontaneous form of communication. The reciprocal trust catalyzes the exchange of experiences and, vice versa, the exchange of information enhances member relationships. Since users decide to group around a specific area or product category on their own initiative, these communities create a particularly interesting target for the company to the extent that it is the result of a process of self-segmentation that ensures a high degree of involvement. Therefore, promoting company-run communication activities through forum or chat rooms based on shared values rather than on specific products can considerably influence the purchasing expectations and trends. In fact, in the best of cases, users can even turn into veritable proselytes of the company's products. In order to support the launch of new products to targeted groups, these communities are sometimes hosted by independent minisites, which differ from corporate sites since they are short term and only designed to promote individual products launched on the market. Alternatively, given their strategic importance for the success of the innovation, sites dedicated to new products can be systematically and even permanently set up within the main site, often with links accessed via the home page.

Customer involvement in the product launch stage can also occur by means of personalized communication, especially newsletters, which focus more on the brand than on the individual product and are sent to a select group of customers according to a permission-based criteria. Providing personalized assistance to help customers choose products can also enhance customer relationship management. Even the organization of events designed to bring together

off-line and online users interested in particular products (which they might even be able to view in advance) can contribute to making them feel part of a select group involved in the new product offer, thus increasing company and user interaction. In fact, the activities related to customer relationship management and personalized newsletters take on crucial importance throughout the entire new product life cycle. These activities allow the company to systematically interact with its customers and consequently obtain regular feedback so it can subsequently upgrade the product. Therefore, Web-based tools increase the opportunity to make new product development an ongoing process that systematically can benefit from customer input.

Conclusions, Managerial Implications, and Future Directions for Research

The purpose of this chapter was to show how companies can use the Web as an enabler of collaborative innovation with customers. While customer knowledge has always played a key role in managing product innovation, today's competitive environment demands going beyond merely importing the "voice of the customer" through traditional off-line means. The Internet allows firms to engage customers more broadly, more richly, and more speedily. It allows firms to create ongoing customer dialogue, absorb social customer knowledge, and scan knowledge of potential or competitors' customers.

While further empirical analysis is needed, our contribution clearly contrasts the traditional perspective on customer involvement in innovation against the emerging perspective of cocreation facilitated by the Web. We illustrate how the unique characteristics of the medium—interactivity, reach, speed, persistence, and flexibility—permit firms to reach new frontiers in the cocreation of value. We then outline a variety of Web-based mechanisms for customer collaboration, highlighting their applicability to the individual stages of the firm's innovation process. Our analysis allows us to draw two managerial implications regarding (a) the emerging opportunity to establish a *direct and interactive dialogue* with the firm customers and (b) the absorption and integration of *complementary forms of knowledge through different mechanisms*.

First, we suggest that Web-based mechanisms complement all existing mechanisms that firms employ in engaging customers in their innovation processes, such as customer surveys and opinion polls. However, the Web allows firms to do more with these mechanisms than they were able to do off-line. By establishing a direct contact through interactive dialogue, firms can now *better select* lead users or, better, let them *self-select*. In addition, the firm is neither constrained by physical boundaries nor by the boundaries of its served markets in the selection of lead users. Customers can spontaneously self-signal themselves by participating in online conversations based on their personal interests. Customers can also participate in virtual communities, which provide the experiential context and a

forum for co-creation. Through the social knowledge-sharing in these communities, the firm can validate ideas and develop product concepts that are robust, because the firm has already been exposed to a form of social control: It is the output of distributed learning and creativity.

Second, we develop a conceptual framework that shows that the Web is an integrated platform for engaging customers in multiple ways for multiple goals. There is a resonance among different forms of customer participation in the company's activities. A strong sense of belonging to virtual communities enables strong social relationships, which increases individual customers' willingness to share their knowledge with the company. Conversely, the ability to develop personalized relationships with individual customers aimed at tapping into their contextual knowledge has a positive impact on their trust and involvement with the firm. The higher involvement in turn enhances customers' intention to participate in communities managed by the company or even by independent third parties. Firms can now also access high-quality customer knowledge even from potential customers, competitors' customers, and nonadopters. In sum, different Web-based mechanisms are synergistic and can be deployed simultaneously by a firm as part of an integrated innovation strategy. Therefore, these tools should not become independent "silos" for customer dialogue. Rather, firms need to connect all these channels into a truly integrated platform for pursuing different forms of knowledge to support different stages of the innovation process.

Future studies could proficiently provide further empirical evidence about the integrated usage of the Web to enable collaborative innovation with customers, developing the analysis at least along two different main streams.

First, following a qualitative approach, the analysis should focus on selected case studies in order to explore the emerging implications of Web-based collaboration from a twofold perspective. From a marketing perspective, it should focus on the firm-customer relationship in order to evaluate the implications of collaboration on brand loyalty, trust, and value perception. From an organizational perspective, attention should be paid to the conditions enabling knowledge transfer and flow, exploring also the criteria supporting effective composition of new product development teams, specific tools accelerating customer knowledge-sharing and deployment within the company, and mechanisms for appropriate payoffs distribution.

Second, following a quantitative approach, the study should directly involve managers responsible for new product development activities to gather firsthand information about the actual usage of the Web to support collaborative innovation. It should cover a large sample of companies, operating in different industries and countries. To this end, a survey could be conducted to collect data related to the logic underlying the adoption of specific Web-based tools and the actual use that companies make of the information collected through the Web to support their innovation process.

REFERENCES AND FURTHER READINGS

- Dahan E., & Hauser J. (2002). Product development—Managing a dispersed process. In B. Weitz & R. Wensley (Eds.), *Handbook of marketing* (pp. 179–222). Thousand Oaks, CA: Sage.
- Dahan E., & Srinivasan, V. (2000, March). The predictive power of Internet-based product concept testing using virtual depiction and animation. *Journal of Product Innovation Manage*ment, 17, 99–109.
- Eisenhardt K. M., & Tabrizi, B. N. (1995). Accelerating adaptive processes: Product innovation in the global computer industry. *Administrative Science Quarterly*, 40(1), 84–10.
- Evans P., & Wurster, T. (1999). Blown to bits: How the new economics of information transforms strategy. Boston: Harvard Business School Press.
- Hargadon, A. B., & Sutton, R. (2000, May/June). Building an innovation factory. *Harvard Business Review*, 78(3), 157–166.
- Leonard B., D., & Rayport, J. F. (1997, November/December). Spark innovation through empathic design. *Harvard Business Review*, 75(6), 102–113.
- Nambisan, S. (2002). Designing virtual customer environments for new product development: Toward a theory. *Academy of Management Review*, 27(3), 392–413.
- Prahalad, C. K., & Ramaswamy, V. (2004). Co-creation experiences: The new practice in value creation. *Journal of Interactive Marketing*, 18(3), 5–14.
- Prandelli, E., Verona, G., & Raccagni, D. (2006, Summer). Webbased innovation diffusion. *California Management Review*, 48(4), 109–135.
- Prelec, D. (2000). *The information pump, center for innovation in product development*. Cambridge, MA: MIT Press.

- Sawhney, M., & Kotler, P. (2001). Marketing in the age of information democracy. In D. Iacobucci (Ed.), *Kellogg on marketing*. Chicago: John Wiley and Son.
- Sawhney, M., & Prandelli, E. (2000). Communities of creation: Managing distributed innovation in turbulent markets [Special issue]. *California Management Review*, 42(4), 24–54.
- Sawhney M., Prandelli, E., & Verona, G. (2003, Winter). The power of innomediation. *MIT Sloan Management Review*, 44(2), 77–82.
- Sawhney, M., Verona, G., & Prandelli, E. (2005, Autumn). Collaborating to create: The Internet as a platform for customer engagement in product innovation. *Journal of Interactive Marketing*, 19(4), 4–17.
- Thomke S. H., & von Hippel, E. (2002). Customers as innovators: A new way to create value. *Harvard Business Review*, 80(4), 74–81.
- Urban, G. L., & Hauser, J. R. (2004, April). "Listening in" to find and explore new combinations of customer needs. *Journal of Marketing*, 68, 72–87.
- Urban, G. L., Weinberg, B. D., & Hauser, J. R. (1996). Premarket forecasting of really-new products. *Journal of Marketing*, 60, 47–60.
- Verona G., Prandelli, E., & Sawhney, M. (2006). Innovation and virtual environments: Towards virtual knowledge brokers. *Organization Studies*, *27*(6), 765–788.
- von Hippel, E. (1994). Sticky information and the locus of problem solving: Implications for innovation. *Management Science*, 40(4), 429–439.
- von Hippel, E. (2001, Summer). Innovation by user communities: Learning from open-source software. *MIT Sloan Management Review*, 42(4), 82–86.
- Wenger, E. (1998). Communities of practice: Learning, meaning, and identity. Cambridge, UK: Cambridge University Press.

COORDINATION IN GLOBAL TEAMS

Mark A. Clark and J. Alberto Espinosa American University

ultinational organizations increasingly accomplish their work through teams that span both local and global boundaries—functions, identity, organizational borders, geographic distance, temporal distance, and culture. Global team performance largely depends on their effectiveness in selecting an appropriate mix of coordination processes—mechanistic, organic, or cognitive—that bridge the particular boundaries present in their teams.

Global teams—defined as interdependent groups whose members are located in more than one country and who interact primarily through electronic communication media—have become increasingly important to multinational firms as a means of organizing work across boundaries of task types, geography, time, and culture. According to the Wall Street Journal, more than one half of medium to large companies report using some form of virtual teams, often globally, with approximately half the total U.S. workforce involved in a virtual team. Global teams are popular because they combine the benefits of collocated work teams (those whose members work in the same place, often at the same time)—skill diversity, flexibility, differential knowledge, and mutual goal orientation—with advantages of virtual environments such as cost savings, proximity to clients, and temporally continuous project work. For instance, global teams are prevalent in software companies such as Oracle, Microsoft, and IBM. In many software projects undertaken by these companies, the critical tasks can be accomplished using project management tools that allow simultaneous document editing, discussions, and multiple simultaneous inputs into work processes. Thus, team members can contribute from any place in the world where they have appropriate software and online access, allowing teams of programmers to work across borders, oceans, and the international dateline in order to deliver their product.

For all their potential advantages, the risks associated with global teams must also be considered. Geography, culture, and time add barriers beyond those of collocated teams. In fact, there is some evidence that face-to-face interaction is more effective for highly intricate tasks. One example of this is a Big 3 automotive manufacturer based in the United States who recently attempted a global team automotive project, realizing too late the lack of synchronicity in engineering protocols across the countries involved. This resulted not only in wasted work hours and turnover of key staff members, but also in a loss of market-entry opportunity and brand equity as compared to rival Asian manufacturers. Firms using global teams must therefore plan against the loss of financial resources, competitive advantage, market opportunity, and key personnel. They must develop means of mitigating risk, orienting each global team's tasks, members, and environments toward the fulfillment of their organizational strategy.

To achieve success, firms must determine the appropriate coordination processes for managing the variable facets

associated with members, tasks, and global boundaries. The global teams must then enact these coordination processes, balancing short- and long-term considerations, industry trends, and available communication technologies. This chapter first describes team tasks and, then, overviews the boundaries faced by global teams—functional differences, social identity, organizational borders, geographic distance, temporal distance, and culture. We then describe and assess the suitability of coordination processes, and describing how well coordinated global teams can help to structure effective transnational organizations. Coordination of task and process occurs through both organic and mechanistic means including communication, human resource management practices, and team knowledge structures ultimately influencing performance at the individual, team, and organizational levels.

TEAM TASK CHARACTERISTICS

Understanding the nature of the task at hand is a critical prerequisite to attempting coordination across internal and external team boundaries for both collocated and global teams. Tasks assigned to teams should represent a connection between team members and the strategy of the larger organization. Tasks vary in complexity as well as in the way in which team members must interact to perform them, and they can be classified into one of four varieties: generation, negotiation, choice, and execution.

One aspect of a team's task is the level of task complexity. Task complexity can be described in three parts: its components, dynamism, and coordination needed. Components of a task must be clearly specified, understood, and recorded—a fact more apparent within a global team than in a collocated team due to the separation of global members. There may be more components as well, due to the increase in member environments as compared to a collocated team. For example, numerous business press articles describe the changes that Nokia, a telecommunications provider specializing in mobile phones, made in its global operations at the turn of the century. Nokia's teams, tasked with bringing the new products up to speed, had an increasing number of components to consider—the new G3 telecommunications network, the increased number of locations and associated supply chains, and the varied interests of the local markets. The teams had difficulty with this task, and Nokia faltered in their efforts to get to market quickly, in part due to their baseline experience with fewer components.

The next aspect of task complexity—dynamism—refers to the rate of change in components and conditions. The state and rate of change is exacerbated by the global environment, such that timing becomes critical as members work around the clock and across time zones. Additionally, as in the Nokia teams example, each local area is subject to fluctuations in the economy, market demands, and other conditions. Finally, coordination of the task components becomes more difficult as global boundaries are added to

a team's context. Team members must find a way to plan, communicate, and build on the work of others across the remaining global boundaries of time, distance, and culture. (We will expand the concept of coordination from dealing with task complexity to the entire global team process in later sections.) Thus, while the inherent structural complexity of a task will not change when it is performed by various members across global boundaries, the coordination complexity associated with the execution of the task will be increased if carried out by global teams.

The manner of interaction between team members necessary to perform a given task is of critical importance. Tasks can be classified, according to a scheme popularized by Steiner, as additive (member efforts are summed as in a tug of war), compensatory (average as in 360 performance appraisal), disjunctive (best of many inputs is chosen), conjunctive (every member's contributions are needed as in many cross-functional tasks), or discretionary (members determine the relationship of inputs to final product; Steiner, 1972). Of these types, only additive interaction would not be a good fit to our definition of a global team. This is not an arbitrary declaration; while global organizations certainly may develop products sequentially across geographic domains, this is a different process than one that demands reciprocal interactions across team members. From a resource perspective, it would not be cost efficient to employ global teams for purely sequential or additive tasks, while lower costs may allow the use of collocated teams on similar tasks.

Finally, tasks are geared toward particular purposes. McGrath's "task circumplex" divides team tasks into four purposes: generation and negotiation, each of which is subdivided into conceptual and behavioral tasks, and *choice* and execution, each of which is divided further into conflictive and cooperative tasks (McGrath, 1984, 1991). Conceptual generation tasks involve creativity, as in the production of ideas, while behavioral generation is more about making specific plans and planning. Some research suggests that global teams may be better at idea generation, as the separation through distance and time removes natural barriers that may inhibit members of a collocated team from speaking—limited speaking opportunities and intimidation by others' ideas—while the communications technology enables all global team members to see every member's input. Additionally, the varied environments for each global team member may encourage consideration of novel inputs. Teams engage in negotiation tasks both conceptually by sharing viewpoints and behaviorally by outlining their preferred approach to particular issues. Negotiation in global teams may reduce interpersonal friction, as members have time to carefully consider each viewpoint expressed, but such teams also may suffer misunderstandings through their relatively lean communication modes.

Tasks that require choices to be made may be intellective, if there is an apparently correct solution (resolved through cooperation or discovery), while choices with no correct solution are termed decision-making tasks and involve some form of process conflict. Other tasks call for something to be completed or executed. Executing psychomotor team tasks requires cooperation between members, while competitive tasks are likely to involve functional and interpersonal conflict as factions jockey for the power to execute in their own manner.

All teams—collocated, virtual, and global—must face the challenges associated varying task characteristics. Next, we discuss the various boundaries that detract from a team's ability to address its tasks in the most efficient and effective manner possible.

GLOBAL TEAM BOUNDARIES

Ideally, organizations use teams to address tasks only when employees can be more effective in achieving desired results by working interdependently rather than through their separate efforts. This value-added effect of working collectively is known as "synergy," which refers to an increase in outcome beyond simple additive effects. For example, the debate among members of a cross-functional product development team, which results in a qualitatively better product than the individuals could have produced sequentially (e.g., if the product was moved from team member to member with no opportunity for reciprocation as on an assembly line), is synergistic. Synergy may be inhibited by what we refer to as "boundaries"—imaginary lines that mark limits of cooperative work within or external to a team. Many boundaries are present in teams, whether collocated teams (whose members share the same physical location at the same time) or global. Together these boundaries may cause the team efforts to be of lesser quality or quantity than the individual employees could have achieved separately, a phenomenon referred to as "process loss." Some of these boundaries such as excessive cohesiveness (which may lead to socializing at the expense of work-related activity) are typically mitigated by characteristics of global teams such as geographic distance. However, these characteristics are themselves boundaries for the global teams, for instance, hindering the amount of trust needed to have meaningful interaction. In other words, while collocated team members may develop social ties that encourage trusting relationships, sometimes leading to excessive social interaction, global teams may lack the minimal interaction necessary to get the job done if they are not able or encouraged to use coordinating process and mechanisms to bridge global boundaries. As such, global team boundaries not only include many of the same boundaries associated with collocated teams but also add boundaries particular to the global context. This has important practical implications; an accomplished collocated team cannot be automatically expected to duplicate this success if its members are no longer able to interact in the same way. Similarly, organizations that wish to use global teams to complete distributed tasks must develop tools and processes that will enable teams to succeed.

We cluster global team boundaries into six major categories: functional differences, social identity, organizational borders, geographic distance, temporal distance, and cultural attributes. Although it is useful to describe these categories in terms of their general impact, one must remember that the extent to which a boundary exists for a particular team or situation depends on the local variation present-for instance, while a given country's population may exhibit a tendency toward risk taking, the individual citizens of that country who serve on a global team may vary considerably along the risk continuum. We refer to the variation associated with the task, process, and global team boundaries as "dependencies," which must be assessed for a given situation to understand the boundaries. Finally, it should be noted that the presence of just one or perhaps more of these boundaries in a team context does not automatically indicate that team to be a global team as we define it. Each boundary in isolation could apply to a range of teams; for instance, a team could have geographic distance within the same time zone and culture, while a collocated team could have members from different cultures. The first two boundaries in especial—functional differences and social identity—may typically be found in nearly every type of team.

Functional Differences

Functional difference boundaries are present when more than one area of expertise or organizational functional is represented on a team such as marketing, engineering, and manufacturing. Research indicates that functional diversity may be linked to both positive and negative performance effects, primarily through its influence on other team processes such as task conflict when unmatched functional perspectives are brought to bear on the same problem. On the other hand, functional variety is often a precursor to innovation and learning in that combining disparate functional information can lead to new insights. Some level of functional overlap is necessary to facilitate interaction among team members. In any case, bridging functional boundaries to coordinate work can be very difficult.

Social Identity

Identity boundaries are present among team members in two distinct modes. First, often, various members' senses of self are not centered on the same social entity—their beliefs about themselves could be anchored in their organization, in their occupational group, or in some aspect of their personal life. Each member or possibly a subset of the team with a shared social identity will classify themselves and others on an in-group or out-group basis, often leading to increased social distance and less interaction among factions. A second, related, type of social identity boundary occurs when individual members are unable to dedicate themselves fully to the team due to their association with multiple social entities. Such members may be working on multiple projects with multiple teams or may hold affiliations to larger

organizational structures in which their teams are nested. It is common for team members to be involved in more than one project, team, or organizational unit at a time, making it difficult for them to define their many identities. Members may also have started a new project before finishing the current one, or the project they are working on may be part of a larger project that has complex interdependencies. These multiple identities and memberships can create strong loyalties, alliances, or adversity with other teams in and outside of the organization. For example, a testing engineer may have been assigned to a software development project, but this developer may have stronger alliances with members of his or her software testing team. Finally, identity boundaries may often delineate who is "in" and who is "out" based on prior work experience working together or how much time members commit to the team when working in multiple projects.

Organizational Borders

Organizational boundaries are present in a team when its members hail from multiple organizations. Firms are increasingly utilizing interorganizational arrangements such as outsourcing, joint ventures, partnerships, and alliances to meet their goals without having to develop expensive and sometimes temporary internal competencies. Differences in organizational affiliations can reduce shared understanding of context and can inhibit a group's ability to develop a shared sense of purpose. For example, a field study investigated the effect of social context on appropriation of communication technology by contrasting how two news organizations used electronic messaging. The study found that groups that were similar with respect to functional structure, task process, technology, communication mode, and tenure—but that had different social contexts with respect to communication climate, management philosophy, and cooperation—had similar patterns of face-to-face and electronic messaging interaction within their group but very different patterns across groups. This led to different levels of communication and performance effectiveness. Issues often arise for groups whose members come from different organizations because they are less likely to share common ground and experiences and they may disagree about how to allocate the group's resources. For example, conflict can arise if members from one organization receive higher pay, better accommodations, or more administrative support than members from other organizations receive.

Geographic Boundaries

Geographic boundaries are more easily defined, as may be thought of as primarily physical separation among team members. However, this separation goes beyond a mere measure of mileage; other factors come into play: ease and availability of transportation, travel time, and number of locations. Furthermore, geographic distance is often thought of as a binary condition—a team is either collocated or distant because once team members are physically separated and even small distances will dramatically reduce the frequency of interaction. The research literature has linked geographic boundaries with many effects on team efforts. For instance, geographic distance has been associated with lower efficiency in completing tasks, less trust among team members, and impairment of negotiation tasks. At the same time, such separation can lead to more innovative solutions. Additionally, it has been demonstrated that team members learn more from distant expertise than from those members in closer proximity. The reasons for this are not always clear; it could be helped by an increase in ideas present in the distinct environments of each member. Perhaps it is also a function of discounting the expertise of those who are already familiar—as noted in the Christian Bible, "A prophet is not without honor save in his own country," or as consultants often intone, "Traveling two states over makes you an expert!"

Temporal Boundaries

The boundary effects of time are not unique to global teams, but the factor becomes increasingly involved in the team's work as along a continuum from collocated, virtual, and global teams. Temporal boundaries include things like differences in time zones, holidays, and work schedules. Time effects may be simple barriers, as when time zone differences hinder team members from immediately or conveniently interacting, but their potential for detrimental effects increases as the shared working hours among team members shrinks while access to resources and markets decreases. Some global teams may actually benefit from these temporal effects, while others suffer from them.

Temporal effects often account for many of the negative effects typically associated with geographic dispersion —the problem does not have to do with distance per se but with the fact that geographically dispersed teams must often interact asynchronously (members providing inputs and feedback at different times) more often than collocated teams must. While most geographically dispersed teams do a substantial amount of their collaborative work asynchronously (e.g., e-mail, wikis, shared data repositories, etc.), the difference with time separated teams is that as the time separation increases, or conversely, as the work time overlap decreases, the choice of whether to interact synchronously or asynchronously becomes restricted by the available time overlap. In extreme cases (e.g., California and India), the work time overlap is essentially zero and teams need to adjust their work hours to overlap for same time meetings or conversations. This can easily be seen by comparing geographically distributed teams to collocated but highly mobile teams whose members interact mostly asynchronously but by choice. While time boundaries also force team members to interact through electronic media, time separation brings about the added challenge of having to pay close attention to timing issues. To begin with, time separation is not only about time zones, but also about differences in holidays, weekdays, work schedules, and vacation schedules, among other things. For example, one study documented the case of a global team in which members were only available to meet synchronously 50 days in the year because of these differences, and during these 50 days, team members still had differences in time zones, reducing the window of available meeting time to only a few hours per year!

On the other hand, time differences can be beneficial when tasks are routine, certain, or well planned. Time zones have been used effectively to develop programs or provide technical support 24 hours a day in what has been called "follow-the-sun" work. However, there are very few documented sustained successful experiences of this collaboration mode for highly interdependent tasks. It has been argued that the reason for this is that time separation reduces delay costs (i.e., the benefit is that one site can work when the other one sleeps), but it also increases communication and delay costs when miscommunication needs to be repaired (i.e., the cost is that one site has to wait until the other one wakes up to communicate). So tasks in which the timing of activities can be programmed with some certainty (e.g., coding of small programs) or those that are not too sensitive to timing issues (e.g., IT support centers) have substantial benefits in reduced delay costs, while tasks that are more equivocal and uncertain, which require substantial interaction, have substantial costs.

Overall, even small time differences can have substantial influence such as in one documented field study of software teams in which a 1-hour time difference between two countries reduced the overlapping working hours by more than 4 hours—2 hours at the beginning and end of the day, 2 hours during lunch time, and additional time because some team members in the earlier time zone often arrived early to work and left early. But these differences can be exacerbated by other temporal context factors (e.g., differences in holidays, differences in vacation schedules, etc.) or mitigated by other factors (e.g., members shift their work schedules, sites have liaison members in both sites with full overlap, etc.).

Generally, though, as the work time overlap is reduced due to time zone or other temporal differences, coordination challenges grow rapidly as more nonoverlapping hours mean reduced communication—members may choose to send messages asynchronously through less rich media (e.g., e-mail), waiting for the overlap for a reply; they may wait until the next overlapping period to communicate synchronously; or they may choose not to communicate at all. Overall, time separation is beneficial when tasks are routine and certain and when the timing of their activities are well organized and teams can effectively use task programming mechanisms to manage key task dependencies. Time separation is detrimental when tasks are nonroutine and uncertain and when they contain tightly coupled dependencies, which require frequent interactive communication to coordinate. The positive or negative effects of time separation on coordination are amplified as the work time overlap between sites is reduced.

Culture

This final boundary category—culture—accounts for much of the distinction between global teams and other virtual teams. Culture, defined as a country's socially held system of values, beliefs, behavioral norms, symbols, and institutions, creates a boundary in global teams through the varying cultural perspectives of the members. Culture is often described as a set of values or dimensions. For instance, Hofstede's widely recognized set includes power distance (expected social inequality), individualism-collectivism (loose or tight social bonds), masculinity-femininity (expression of competitive or nurturing traits), uncertainty avoidance (preference for structured or unstructured situations), and long-term versus short-term orientation (live for today or think about the future; Hofstede & Bond, 1984). Additionally, other dimensions identified include high context versus low context (conveying meaning through either situational cues or more directly through words), monochronic versus polychromic time (precise versus multidimensional and personal), and proxemics (feeling of appropriate interpersonal space).

Values are the heart or deepest layer of culture. They influence both the expression and interpretation of more concrete indicators of culture-work styles, norms of interaction, expectations of others, and ascribed significance to symbols and artifacts. Differences in such values and norms may hamper the ability for global team members to understand one another's motivations and intentions, ultimately adding complexity to the task at hand. For instance, team members of very collectivistic, family-oriented cultures may be somewhat offended by a remote member who never seems concerned about the well-being of other team members but who, instead, focuses exclusively on business. Members of high-context cultures may be frustrated by the lack of rich information available through telecommunications technology or may interpret meaning from the communication that a member of a lower context culture did not intend. Other behaviors such as deference to authority—whether it is appropriate to question team members who have higher status, regardless of expertise—can significantly influence how a team tackles a project that demands a full, critical examination.

Any time the subject of human differences is discussed, cultural or otherwise, it must be remembered that, while large groupings of people may differ on average from other groupings, individuals tend to vary considerably within the groupings. In other words, just because there may be some legitimate differences between cultures does not mean that every member of that culture will hold the same value set—consider each culture as a possible continuum of values, but get to know each person on their own merits. It should also be noted that teams may develop a culture of their own, based on the agreement of members to operate according to specific guidelines or the values of dominant team members. This dominance can be related to organizational authority, expertise, or simply popularity among the team

members. Individual members will differ in their deviation from the team norm, and may thus be differentially motivated or able to contribute to the total team effort. Finally, note that language differences may themselves represent a portion of the culture barrier in global teams. Persons from distinct cultures may not only use different words to describe similar concepts but may also hold those concepts to be of greater or lesser importance.

GLOBAL BOUNDARIES AND TEAM COORDINATION

Atos Origin is an information technology company that provides software solutions for Olympic events including Salt Lake City in 2001, Athens in 2004, and Turin in 2006 and is now preparing for the 2008 (Beijing) and 2010 (Vancouver) games. Atos' Olympic team ranges in size from 15 to over 2,000 members from nearly 40 countries, building in size and complexity as each event approaches. Its members work in teams centered on specific solutions, working across time, geographic distance, and cultural boundaries. Claude Philipps, a systems-integration team leader, ensures that team members use both technology and in-person interaction, when possible, to overcome global boundaries, saying, "It's more of an imperative to be global, and to be smart about it, than it's ever been before" (as cited in Kirsner, 2004, p. 85).

The heart of the coordination challenge faced by global teams is the need to bridge multiple internal boundaries in order to manage the dependencies among their task activities. This challenge is increasingly important for organizations seeking to take advantage of the shift to a more global economy, with markets and resources scattered across the globe. In one recent study of a global software development organization, team members were found to have bridged multiple boundaries to do their jobs, including 15 global locations, 19 time zones, and various levels and areas of technical expertise. The presence of functional, identity, organizational, geographic, temporal, and cultural boundaries disrupts the flow of communication among team members, creating two main challenges for team coordination.

First, some coordination processes and systems mechanisms available to collocated team members are not generally available to global team members. For example, some global team members may have never worked face-to-face and may have never met each other, thus making it difficult to develop mutual knowledge. Similarly, task awareness and presence awareness are not likely to be readily available to global teams as compared to collocated teams. Also, global team members cannot meet as frequently and as spontaneously as collocated members.

The second challenge is that the effectiveness of available coordination mechanisms may be influenced by their characteristic internal boundaries. For example, communication via e-mail can be adversely influenced by language boundaries in a team, especially if compounded by language

differences between high-context and low-context cultures. Similarly, the effectiveness of e-mail can be severely impaired if there are large time zone differences among team members.

COORDINATION THEORY: ORGANIC AND MECHANISTIC PROCESSES

Team coordination is the process of effectively managing dependencies (interrelationship and variations among factors) associated with the collective pursuit of task activities In global teams, coordination efforts occur among all team resources, both tangible (e.g., members and finances) and intangible (e.g., knowledge), and they may be associated with successful performance outcomes as well as with costs and losses incurred in the process. Coordination efforts among team members may be pooled, sequential, or reciprocal. Pooled dependency results from the need to use the same resource, as when a decision-making group consults the same set of organizational policies, while sequential dependency may be illustrated through an assembly line, where each successive station relies on the previous but not vice versa. Finally, reciprocal dependency exists when two or more entities use the same resource nonsuccessively, as when developing software code among a group of programmers. Whether pooled, sequential, or reciprocal, explicit coordination processes can be mechanistic or organic. In addition, members can also coordinate implicitly through team cognition structures, which helps members understand what others in the team are doing and plan their own activities accordingly, ultimately influencing performance outcomes at individual, team, and organizational levels.

Mechanistic Coordination

Team members coordinate most routine aspects of the task by implementing and using task-programming mechanisms. Mechanistic systems are relatively structured and stable, following predictable patterns, and they are designed to reduce costs of more routine tasks. Instead, resources are invested up front in preparing systems that may be applied to multiple instances of similar situations and problems. Mechanistic solutions are task oriented and tend to be stable once implemented. For instance, schedules, plans of work, division of labor, and other collaboration tools may be used to routinize organizational tasks such as when structuring a routine task from job analysis data. Some task programming processes are very specific to particular tasks such as configuration management systems used by software organizations to manage concurrent development, workflows, error repairs, and outstanding issues. It is not expected, however, that these tasks are identical in appearance. Rather, they are categorized according to an initial evaluation and, then, broken down into subcomponents and decision points based on preconsidered factors. Coordination, thus, is accomplished through a relatively automatic, stepped process that encompasses both preparation and operation stages.

In the preparation stage, first a pool of potential decision scenarios are developed through various means including past experiences, benchmarking competitors, and projection of selected environmental factors. Then, organizing frameworks are developed for examining the current situation, with prescriptive factors to consider, weighted according to their likely influence on the performance outcome. These frameworks are stored in organizational memory structures that may be easily accessed by teams that encounter similar situations. These memory structures may be encoded in procedure manuals, incorporated into team member training, or otherwise instituted as organizational and team policies. For instance, the superintendent of Washington, D.C., schools outlined his structured approach for gathering data and making decisions about school closings with his virtual staff of school administrators—once an incoming winter weather event is identified, each principal reports on factors including snow composition and depth, student transportation modes, road clearance progress, and staff availability. These factors are weighted according to past experience and used to calculate a decision that only the superintendent has authority to modify or reject. In global teams, these decisions rules and procedures are often incorporated into software programs such as project management utilities and are carried through by other technological aids including telecommunications hardware—telephones, e-mail, and video technology.

The next stage of the mechanistic processes is operational—starting when a team faces a situation (a coordination opportunity) and examines it for similarity to any of the preconsidered scenarios. Once a situation is identified as fitting such a category, it is measured according to the factors included in the scenario. A decision is reached through conformity of these factors to preestablished levels, launching a flowchart of activity or decisions with recommended actions based on each factor. Coordination is thus achieved with a minimum use of resources—reducing consideration of extraneous factors, uncertainty in decision authority, team member time, associated financial investment, and market opportunity.

Each team or organization sets parameters for its reliance on mechanistic means for its decisions, with resulting systems ranging from completely mechanistic to having less rigid components. A discretionary span may be included for specific factors including allowance for further investigation if preset specifications are exceeded. Review points are often established, empowering team members to check the validity of a decision path, as with the Washington, DC school superintendent's final decision authority in the previously mentioned illustration. For example, when McDonald's sought to expand its fast food franchise into China, its franchise team, drawing members from United States and European bases as well as local Chinese partners, were charged with assessing the operations potential with preset criteria. Considerations included relatively known

factors real estate availability, competitor positions, labor costs, and market potential as well as more tailored factors such as local food preferences, mealtime norms, and other cultural aspects. Coordination of the team decision process, therefore, was based on a mechanistic decision scenario, but it included room for elements that were not known at the outset of the process. McDonald's opened its first People's Republic of China franchise in 1990 in Shenzhen; today, it operates hundreds of successful franchise stores in China (McDonald's China, 2007).

In today's information age, mechanistic coordination is often enabled and achieved through information technologies. Team members increasingly use tools like wikis, blogs, shared calendars, technical Web sites, and communal databases to exchange information and coordinate their work. Specific fields like the medical practice or software development often use sophisticated collaboration tools designed for that field. For example, studies have found that software configuration management systems are excellent mechanistic coordination tools to help multiple software developers work in parallel on multiple versions of very large software without interfering with each other.

Generally speaking, mechanistic coordination processes and tools have a high setup cost—both financially and in terms of learning time. However, once in place, they tend to be very low cost and very effective for coordination, particularly for routine tasks. Because mechanistic programming helps to coordinate the most routine aspects of the task, once the use of these systems are learned and internalized, their effectiveness is less likely to be affected by external or internal team boundaries. In addition, most mechanistic task program systems are designed to be used asynchronously, reducing the inhibition of global boundaries on their operation. For example, global software developers can achieve coordination through software tools like configuration management systems, which developers can access at their convenience. Similarly, coordination in large-scale software development firms can be accomplished through division of labor such as by maximizing dependencies within each site while minimizing dependencies across sites (e.g., keeping the design in one site and the coding in another site). Overall, mechanistic systems can be quite effective in helping teams to coordinate tasks across global boundaries. Some recent research provides evidence that, while mechanistic coordination is generally thought to be less effective for nonroutine tasks, it may actually be beneficial to program and mechanistically coordinate an increasing number of task activities—making tasks more routine—rather than spend resources attempting the difficult task of communicating across global boundaries.

Organic Processes

Organic processes, used for less routine aspects of tasks, are flexible, often emergent responses to unpredictable or changing conditions. In contrast to mechanistic coordination, organic coordination usually has relatively little setup

investment. However, its ongoing costs in addressing idiosyncratic and equivocal situations are higher due the need for multiple team members to individually participate in situation assessment, decision making, and intrateam dialogue. Organic processes are often completely spontaneous. For example, studies have shown that a lot of the organic coordination in software tasks happens through spontaneous encounters in public places like water coolers and coffee rooms. At the same time, good teams often anticipate and plan their use of organic coordination means. They may measure how coordination influences outcomes by including which factors are most related to coordination success in their organization and, then, by designing training and support systems to encourage organic responses.

For instance, the U.S. Coast Guard has imposed a system, Team Coordination Training (TCT), which seeks to improve safety and rescue outcomes through emphasizing the factors beyond simple technical prowess such as communication, situation awareness, and adaptability. Included in TCT's process view are not just local responders to an incident but are a wider range of affected stakeholders including onshore Coast Guard support, cooperating authorities (domestic and foreign), and a view of the customer that extends to the entire affected community. The Coast Guard credits this increased emphasis on team coordination with a mishap reduction between 50%–66% on its boats and cutters over a period of 6 years (U.S. Coast Guard 7th District Director of Auxiliary West, 2006).

Communication

The most typical organic processes involve some form of communication among team members and their supportive networks. Dynamic conditions are dissected, understood, and resolved through dialogue and information sharing via any of a multitude of communication modes: interpersonal or mass delivery; written, audio, or video formats; and face-to-face or indirect system. In order for this communication to be possible, teams must build conduits for information delivery—shared understanding of concepts, affiliation bonds among members, expertise directories, telecommunications devices, or other technological systems. For example, organic processes would be useful during an unanticipated hardware breakdown, when events unfold unpredictably and structured task programming would not adjust, but a lack of prior established communication protocols would make the coordination process very difficult, if not impossible.

It is often suggested that global teams require even more frequent interaction and information exchange, due to the relatively lean communication media used—e-mail, telephone, and even videophone systems often fail to transmit important contextual details, especially when bridging culture divides in addition to geographic and temporal distance. Additionally, it should be noted that teams cycle through stages of development such as Tuckman's widely recognized forming, storming, norming, and performing

stages (Tuckman, 1965). Teams will not necessarily engage in the same coordination strategies at different points of the cycle. Some evidence suggests, for instance, that once engaged in productive activity, higher performing teams communicate less than lower performing teams during the performing stage. This demonstrates that coordination is not simply about the amount of communication, but the effectiveness of the message and the comprehension of those at the receiving end of the process. In other words, coordination through communication is effective to the extent that the communication is needed and is task oriented.

Overall, members of global teams tend to coordinate the less routine aspects of their tasks through communication systems. Such interaction may consume more time and effort than more mechanistic, task-oriented processes, sometimes diverting attention from other critical tasks. For example, a study of global IT project managers found that teams can be very successful when working globally but that this success requires considerable additional time and effort to coordinate things (e.g., working longer hours, frequent traveling, and overdetailed specifications and documents) when working across team boundaries. Beyond simply adding more coordination difficulties individually, an increased number of boundaries may combine to form deeper "fault lines" that hamper team members' ability to get work done. Generally speaking, team boundaries associated with global teams make it difficult for members to communicate effectively, leading to misunderstandings and reduced mutual knowledge or common ground, and opportunities for informal communication. By their nature, however, such organic processes are needed to coordinate nonroutine demands. As such, global teams should anticipate both the need for communication conduits and build the time and other resources needed into their operational schedules.

COORDINATION THROUGH TEAM COGNITION

While teams use mechanistic programming and organic processes to coordinate their work, their effectiveness will be limited unless team members understand how to use these task processes and have some common grounding in their communication. For example, new team members must learn an organization's configuration management system before they can effectively apply in using the organization's software. Team members who have had similar training or worked on common projects in the past will be likely to share concepts and terminology, thus improving their ability to communicate effectively. In this way, team cognition may enhance the effectiveness of other coordination mechanisms. At the same time, team cognition can help team members coordinate implicitly because they can make accurate assumptions about what others in the team are likely to do. A shared understanding of key aspects of the task—how the team interacts, who knows what, who has done what recently, and how well team members know the task domain and each other's work contexts—can enhance coordination.

The literature on team cognition suggests that effective team members develop organized shared knowledge about both task and team, which helps them to coordinate implicitly in two ways. First, it can have a direct effect on coordination because any form of shared knowledge helps individuals anticipate other members' actions and develop explanations about the task more accurately, helping them plan their own actions more effectively with little communication. This form of implicit coordination has been shown to be very effective with fast-paced, real-time teams (e.g., sports teams, military squadrons, and surgical teams) in which there is very little time to communicate. Second, shared knowledge of the task, team, context, and tools makes both organic and mechanistic coordination more effective because members have more common ground and understand how the team should use the mechanisms or processes.

While the benefits of team cognition have intuitive appeal and widespread research interest, this elusive construct has proven to be very difficult to define and operationalize with precision. Organizing the many team cognition constructs present in the literature is outside the scope of this chapter, but in the short term, we suggest organizing team cognition constructs through Cooke et al.'s typology, which classifies team knowledge into two types: team mental models and team situation models (Cooke et al., 2000) Team mental models—organized knowledge shared by members about the task and the team—develop slowly as team members train together and interact over time and are important for coordination because any two team members need to have some overlapping knowledge about each other's task domains in order to understand and better manage the dependencies involved. However, too much shared knowledge can be detrimental when it wastes organizational resources through redundancy or groupthink. Therefore, many tasks optimally require only a small shared knowledge base about the task but, instead, will require a greater shared knowledge of the team. In other words, because individual knowledge is so specialized, knowing what others in the team know and when each reservoir of expertise should be brought to bear to the task becomes very important. These related concepts—variously termed transactive memory, expertise coordination, shared knowledge of the team, and team familiarity—have been found to help performance in software, military, and aviation tasks. Overall, this type of knowledge about team members helps coordination because individuals know where to find expertise and can better anticipate the actions of others.

While shared knowledge is important, it may fall short of helping with very dynamic tasks. More useful is another type of team cognition, team situational awareness, defined as understanding the context of one's activity as resident within the activities of others. It could be compared to "court sense" when playing basketball—the ball

handler is aware of her own dribbling and footwork while simultaneously placing herself within the greater context of teammates and competitors. When working in teams, members not only need individual situation awareness to carry out their task responsibilities, but they also need team situation awareness to work together as a coordinated unit. Team situation awareness, therefore, is essential when members need to coordinate work with tightly coupled interdependencies. This concept has received a lot of attention in military and aviation research with synchronous teams working on real-time tasks (e.g., crew flights), and encompasses three processes within a team context: (a) perception of what is happening with the elements of the system and its environment at any time, (b) comprehension of what they mean, and (c) projection of their status into the near future. As acceptance of this concept grows, substantial efforts are being made among collaboration tool researchers to create electronic tools that provide effective support for aspects of team situation awareness such as task awareness (knowing what has been done, by whom, and when) and presence awareness (knowing who is around—think of your instant messaging icon).

Other tool design researchers have defined several other types of team awareness such as activity awareness (knowing the actions of other team members at any point in time); availability awareness (knowing if other team members are available for interaction); process awareness (knowing which steps need to be taken to move the team process along); perspective awareness (knowing how to make sense of others' actions); and environmental awareness (knowing about events external to the immediate work space that have implications for the team's activity).

Awareness is important for coordination in collaborative tasks that contain interdependent activities because it helps individuals shift from individual to shared activities seamlessly and with ease; it helps them anticipate how the task will progress and which actions other team members will undertake; and it helps them make things happen in the right order and at the right time without conflicting with others in the team because members have a better understanding of the sequence of things and the temporal boundaries of their actions. Such chronological awareness improves team member connectedness, helping synchronize task activities and, thus, positively affecting coordination.

CONCLUSION: ACHIEVING THE APPROPRIATE COORDINATION MIX

From our overview, it is evident that teams use an array of coordination methods—organic or mechanistic processes as well as a class of more recently understood forms of team cognition—to navigate their internal boundaries. A team's choice of coordination solutions will depend on the nature of the task, its global context (which boundaries are represented and where), the nature of the dependencies present (the various activities necessary to complete the task

with the particular set of members and conditions), and the personal preferences and predispositions of team members to coordinate with some mechanisms and not with others. It is important to recognize that each team may select a mix of mechanistic, organic, and cognitive coordination processes that best fit its particular situation. This select may depend on the coordination needs of the task, personal preferences, prior experience, or a variety of other factors. Different teams making different choices may achieve similar levels of coordination using their idiosyncratic mix. For instance, three teams can be highly coordinated, one primarily through intensive and effective communications, another through sound task programming mechanisms, and the other through strong team cognition or through some combination of the three.

As alluded to in the previous example of McDonald's Chinese franchise operations, not only might teams employ a mix of mechanistic, organic, and cognitive coordination processes appropriate for their tasks, but this mix may change over time and situations. The combination of these coordination processes may be especially powerful when applied to larger groupings. One vivid example of this (at least to this chapter's authors, both of us being professors) is an academic conference that organizes thousands of people through mechanistic programming early in the organizing process such as through conference program books and Web sites, yet that triggers on-site organic communication through hallway conversations, postpresentation discussions, and the shared knowledge of specific topics.

Global teams will select a mix of coordination processes—mechanistic, organic, or cognitive—that they deem most effective in bridging the particular boundaries present in their teams. By focusing on coordination of clearly defined boundaries—functional, identity, organizational, geographic distance, temporal distance, and national culture—teams can best utilize their internal resources, promote effective member relationships, and ultimately achieve their fullest potential on the global stage.

REFERENCES AND FURTHER READINGS

- Carmel, E. (1999). *Global software teams*. Upper Saddle River, NJ: Prentice Hall.
- Cooke, N. J., Salas, E., Cannon-Bowers, J. A., & Stout, R. J. (2000). Measuring team knowledge. *Human Factors*, 42(1), 151–173.
- Espinosa, J. A., Cummings, J. N., Wilson, J. M., & Pearce, B. M. (2003). Team boundary issues across multiple global

- firms. Journal of Management Information Systems, 19(4), 157–190.
- Espinosa, J. A., Lerch, F. J., & Kraut, R. E. (2004). Explicit vs. implicit coordination mechanisms and task dependencies: One size does not fit all. In E. Salas & S. M. Fiore (Eds.), *Team cognition: Understanding the factors that drive process and performance* (pp. 107–129). Washington, DC: American Psychological Association.
- Gibson, C. B., & Cohen, S. G. (Eds.). (2003). *Virtual teams that work: Creating conditions for virtual team effectiveness*. San Francisco: Jossey-Bass.
- Gutwin, C., & Greenberg, S. (2004). The importance of awareness for team cognition in distributed collaboration In E. Salas & S. M. Fiore (Eds.), *Team cognition: Understanding the factors that drive process and performance* (pp. 177–201). Washington, DC: American Psychological Association.
- Hinds, P., & Kiesler, S. (Eds.). (2002). *Distributed work*. Cambridge, MA: MIT Press.
- Hofstede, G., & Bond, M. H. (1984). Hofstede's culture dimensions: An independent validation using Rokeach's Value Survey. *Journal of Cross-Cultural Psychology*, 15(4), 417–433.
- Kirkman, B. L., & Mathieu, J. (2005). The dimensions and antecedents of virtuality. *Journal of Management*, 31(5), 1–19.
- Kirsner, S. (2004). Time (zone) travelers. Fast Company, 85, 60–66.
- Majchrzak, A., Rice, R. E., Malhotra, A., King, N., & Ba, S. (2000). Technology adaptation: The case of a computersupported inter-organizational virtual team. MIS Quarterly, 24(4), 569–600.
- Markus, M. L., Manville, B., & Agres, C. E. (2000). What makes a virtual organization work? *Sloan Management Review*, 13–26.
- McDonald's China. (2007). McDonalds China home page. Retrieved September 1, 2007, from http://www.mcdonalds.com.cn/
- McGrath, J. (1984). *Groups: Interaction and Performance*. Englewood Cliffs, NJ: Prentice Hall.
- McGrath, J. (1991). Time, interaction and performance (TIP). *Small Group Research*, 22(2), 147–174.
- Powell, A., Piccoli, G., & Ives, B. (2004). Virtual teams: A review of current literature and directions for future research. *Data Base for Advances in Information Systems*, 35(1), 6–36.
- Salas, E., & Fiore, S. M. (Eds.). (2004). *Team cognition: Understanding the factors that drive process and performance*. Washington, DC: American Psychological Association.
- Steiner, I. (1972). *Group process and productivity*. New York: Academic Press.
- Tuckman, B. (1965). Developmental sequence in small groups. *Psychological Bulletin*, *63*, 384–399.
- U.S. Coast Guard 7th District Director of Auxiliary West. (2006, April 4). *Team coordination*. Retrieved August 31, 2007, from http://www.dirauxwest.org/TCTF/team_coordination1.htm

Transnational Teams in Knowledge-Intensive Organizations

MARTINE R. HAAS

University of Pennsylvania

MALLIKA BANERJEE

Cornell University

ith the advance of globalization, organizations in the 21st century increasingly cross national borders in their efforts to develop scale, efficiency, and new markets. Operating across borders creates the critical strategic challenge captured in the popular international management mantra: "think global, act local." To be successful, transnational organizations must combine global integration of their operations with local differentiation that customizes those operations to each unique country environment. Much early research on multinational enterprises focused on the need to design the formal organizational structure to meet these imperatives, but in recent years scholarly and managerial attention has turned to the central role of knowledge-based resources and capabilities. New strategic management approaches argue that the dissemination and utilization of knowledge, as well as its creation and retention, are essential for organizational effectiveness and sustained competitive advantage. This perspective suggests that multinational enterprises must ensure that their transnational teams obtain and use relevant knowledge as effectively as possible in their work if they are to successfully integrate global best practices and lessons learned around the world with customized approaches to the varied local country environments in which they operate.

In this chapter, transnational teams are defined as groups of individuals who work interdependently on tasks or projects that span national borders. Transnational teams typically feature several characteristics of "virtual teams." They are often multicultural and multinational (composed of individuals from different cultures and countries), geographically dispersed (with members situated in different locations), structurally dynamic (subject to frequent changes in members, roles, and relationships), and dependent on electronic technologies for much of their interaction. Although transnational teams usually exhibit at least some of these characteristics, they do not always exhibit all of them, and not all virtual teams are transnational. Scholars also sometimes refer to "global teams" or "international teams," but these are rarely distinguished from each other or from transnational teams. We use the term transnational teams here to highlight the role of such teams in helping transnational organizations to meet the challenge of thinking globally while acting locally.

We focus specifically on transnational teams that are engaged in knowledge-intensive work, defined here as tasks or projects for which the primary input is knowledge, rather than capital or labor. Knowledge is broadly conceptualized as task-relevant information, data, intelligence, or advice that can be conveyed through documents or interpersonal interactions. While not all teams in multinational enterprises carry out knowledge-intensive work, increasingly many do, especially those that exhibit virtual team characteristics.

The chapter is organized in three main sections. We begin by outlining the major strategic challenges for multinational enterprises in the face of rapidly increasing globalization and explaining how they are addressed by the knowledge-based view of the firm. Scholars working in this area are fundamentally concerned with the importance of knowledge utilization for improving the overall performance of firms, but relatively little attention has been given to examining the characteristics, processes, and outcomes of the teams that often actually perform the work of the firm. Consequently, this research does not explain how transnational teams can acquire and apply knowledge in their everyday tasks in ways that improve their effectiveness and the performance of the multinational enterprise.

Nevertheless, there is substantial literature on transnational teams, as we discuss in the next section. Most of this research takes an internal perspective on team effectiveness that focuses on the consequences of national, cultural, and geographic diversity for intragroup dynamics. Overall, studies of these characteristics demonstrate that transnational teams often suffer from problems that impede internal cooperation, cohesion, trust, and innovation. The internal perspective on team effectiveness overlooks the interactions between teams and their environments, however, as well as the effects of organizational contexts on teams. Additionally, the team member characteristics studied often relate only distantly, if at all, to the different levels and types of knowledge and expertise that different members bring to their transnational teams.

As an alternative, we discuss external perspectives on transnational teams. Two approaches are particularly relevant here: studies of boundary-spanning activities and research on the social networks of team members. The external perspective on teams has proven useful in focusing attention on the important role of team-environment interactions, but this research does not examine how knowledge acquired from external sources is applied within the team. Moreover, very few studies from an external perspective have been conducted on transnational teams, so again the connections between transnational team member characteristics, processes, and outcomes remain less than fully elucidated.

The remainder of this section highlights research that has begun to address these issues more directly. While the extent and scope of such studies are limited at this time, they include qualitative explorations of transnational teams that take an internal perspective but depart from prior research by examining knowledge utilization directly, as well as studies that apply an external perspective to the specific context of transnational teams. They also include studies that move toward integrating the internal and external perspectives with explicit attention to knowledge-related processes in transnational teams. We conclude in the final

section with a discussion of promising directions for future research

KNOWLEDGE-BASED VIEW AS A STRATEGIC MANAGEMENT THEORY OF THE MULTINATIONAL FIRM

The purpose of strategic management theory is to explain why some firms perform better than others. For multinational firms in particular, the major strategic challenge in achieving superior performance is widely agreed to be the need to "think global, act local." In an early articulation of this view, Prahalad and Doz (1987) questioned the prevailing wisdom of matching the structure of a multinational enterprise to its industry (e.g., centralized, globally integrated firms in the electronics industry versus decentralized, locally responsive firms in telecommunications). Instead, they proposed that multinational enterprises should incorporate differentiated approaches to businesses, countries, and functions. Strategic management scholars since have devoted considerable effort to articulating and understanding this insight's organizational design implications, which fundamentally require combining local differentiation among contexts with global integration across the multinational enterprise.

In their seminal book, Managing Across Borders: The Transnational Solution, Bartlett and Ghoshal (1989) highlighted three key strategic requirements facing multinational firms today: the need for efficiency as a means to global competitiveness, responsiveness as a means to flexibility, and learning as a means to innovation. They argued that in less complex environments, firms created strategies that emphasized one of these needs to the virtual exclusion of the others, but today's global business environment demands that firms respond to all three strategic imperatives simultaneously. To balance a complex worldwide strategy, the authors championed a new "transnational" model of the firm. In a transnational firm, some resources and capabilities are centralized at headquarters to realize scale economies and protect core competencies (e.g., basic research), while some are centralized elsewhere (e.g., labor-intensive production in low-wage countries), and others are decentralized to create flexibility (e.g., marketing). Management must balance the diverse perspectives and responsibilities of the organizational units so that no single group dominates, and encourage a shared vision and commitment to integrate the diverse members of the organization.

Subsequently, Nohria and Ghoshal (1997) expanded on this framework to envision the transnational firm as a differentiated network of subunits. This network is composed of resources that are distributed across units but connected through different types of relations: local linkages within each national subsidiary, linkages among headquarters and the subsidiaries, and linkages among subsidiaries themselves. The differentiated network is characterized by

flexible role-playing rather than rigid hierarchy, whereby each element contributes to the firm commensurate with its skills and needs, and neither the corporate headquarters nor the national subsidiaries dominate the firm. In this framework, knowledge is created jointly and disseminated through networks between headquarters and subsidiaries as well as among subsidiaries.

Recently, a different perspective has emerged in the strategic management literature: the knowledge-based view of the multinational enterprise. Among the foremost proponents of this view are Kogut and Zander (1993), whose approach is informed by three perspectives: behavioral, transactioncost-based, and resource-based views of the firm. The behavioral approach, as developed by March and Simon (1958), views the firm as a coalition of individuals and groups, and focuses on how goals of the firm are set and decisions are made within organizations. The general argument is that the cognitive limits of individual decision makers and the variety of challenges posed by tasks and environments require that firms reduce the information-processing demands on their members. Organizations therefore develop repositories of action, programs, and routines which simplify decision making by serving as the alternatives of choice in recurrent situations. Thus, firms accumulate knowledge beyond that embodied in individual members.

Williamson (1975) further developed and integrated these insights into the transaction cost theory of the firm, which views individuals as fundamentally opportunistic. Because they also exhibit bounded rationality (i.e., although rational, they have limited information-processing capabilities), it is impossible to construct the complex contracts that would be required to cover all possible risks of opportunism in the absence of some form of organizational structure. Williamson contended that firms are more effective than markets in economic exchanges characterized by high asset specificity, frequent interactions, and uncertainty, because they control opportunism and lower the costs associated with negotiating contracts. Thus, he built on the idea that firms exist because they can mediate economic transactions at lower costs than markets and extended it further by specifying the conditions under which it is more efficient to replace market transactions with internal organization.

Despite the insights that transaction cost theory offers about the existence of firms, scholars have critiqued it for failing to explain differences in firm capabilities and performance (Liebeskind, 1996). The resource-based view of the firm, in contrast, underscores the role of unique resources and capabilities as the fundamental determinants of heterogeneity in firm performance (Wernerfelt, 1984; Barney, 1991). Central to the resource-based view is the distinction between resources, which are tradable assets and often tied to individual members, and capabilities, which are tacit, socially embedded in organizations, and historically dependent, and hence not tradable. The theory contends that the development and leveraging of rare, inimitable, or nonsubstitutable resources allows firms to take advantage of opportunities or overcome threats in their environments.

Building on the above approaches, Kogut and Zander's (1993) evolutionary view of the multinational enterprise considers knowledge to be the most significant resource of the firm and critical for achieving sustained competitive advantage. A distinction is drawn between explicit knowledge which can be codified in the form of facts, analysis, documents, and best practices, and tacit knowledge such as insights, intuition, and assumptions which are harder to articulate and transfer. The argument is that because knowledge-based resources are difficult to imitate and socially embedded, especially if they are tacit, heterogeneous knowledge bases and capabilities among firms are the major determinants of superior firm performance. Thus, Grant (1996) identified the primary role of the firm as integrating the specialist knowledge of individuals into goods and services and the primary task of management as arranging the coordination necessary for this knowledge integration.

Kogut and Zander (1993) further propose that firms are social communities that serve as efficient mechanisms for the creation, internal transfer, and recombination of knowledge, often by lowering the cost of communication and coordination through multiple mechanisms including organizational culture and identity, policies, routines, documents, and systems. The multinational corporation thus arises not because of the failure of markets at buying and selling knowledge, but because of its superior efficiency as an organizational vehicle by which to transfer and recombine this knowledge across borders. From this viewpoint, the firm is a repository of social knowledge which exists in relationships among individuals or groups; cooperation within the firm generates a set of capabilities that are easier to transfer internally than across firms and thus constitute the advantage of the firm over the market. These insights have been empirically explored in a study of knowledge transfers by Gupta and Govindarajan (2000), who examined how inflows and outflows of knowledge across the subsidiaries of multinational corporations are influenced by the motivation of the source and target, as well as the value of the source's knowledge, the absorptive capacity of the target, and the nature of the transmission channels.

A central contribution of the knowledge-based view is that it conceptualizes knowledge as a multilevel concept by treating it as a characteristic of firms and groups, not just individuals. Theoretical and empirical attention has focused primarily on the firm level of analysis in exploring how knowledge is embedded in organizationwide systems, networks, routines, and practices, however, while much less attention has been devoted to the role of groups within the firm. Yet attention to the group level of analysis is critical because knowledge—especially valuable tacit knowledge-may be better coordinated in team-based rather than individualist settings (Grant, 1996). We know even less about the distinctive challenges faced by transnational teams in particular, which have unique characteristics that may enhance or impede their ability to acquire and apply relevant knowledge for their tasks. The potential importance of teamwork in multinational enterprises highlights the need to better understand how the acquisition and application of specialized knowledge is carried out by transnational teams going about their daily work, and when that leads to superior performance at the group level as well as the firm level. We therefore turn to the literature on teams to develop a better understanding of how transnational teams carry out knowledge-intensive work.

INTERNAL AND EXTERNAL PERSPECTIVES ON TEAMS

Research on transnational teams has proliferated in recent years. The vast majority of this research, like the broader literature on traditional teams, takes an internal perspective on teams that emphasizes team member characteristics and intrateam processes. Most commonly, the focus of the transnational team research is on the influence of national, cultural, or geographic diversity in team membership. Research on knowledge utilization focuses on the use of internal knowledge (possessed by the team members themselves), while external knowledge (available from sources outside the team) is not considered. In contrast, a minority of studies takes an external perspective on teams that gives special attention to the relations between team members and their environments and explicitly addresses the utilization of knowledge from outside the team. Some of these studies take traditional team effectiveness research as their starting point while others build on the social networks literature, but very few have been conducted internationally. In this section, we discuss the internal and external perspectives on teams in turn, before addressing the potential for integrating these perspectives and situating them in the distinctive context of transnational teams.

Internal Perspectives

Much research on transnational teams considers the consequences of team member differences in the form of national or cultural diversity for processes such as communication, trust, or conflict within the team. In one of the earliest studies on this topic, Adler (1986) proposed a model of multicultural team effectiveness in which she argued that culturally homogeneous groups are likely to be more effective than culturally heterogeneous groups, and that multicultural teams will be either highly effective or highly ineffective. Adler explained this variation in effectiveness by proposing that multicultural teams offer high potential for performance on complex tasks because their members bring diverse perspectives and strengths, but they often fail to fulfill that potential because of difficulties in harnessing this diversity.

Building on Adler's thesis, Hambrick, Davison, Snell, and Snow (1998) offered a conceptual understanding of the implications of multinational composition for group functioning. Their framework proposes that nationality affects team members' values, cognitive schema, demeanor, and

language. Following Hofstede (1991), values are defined as broad predispositions to prefer certain states of affairs over others, including preferences for individualism versus collectivism, power distance, and relationship to time. Cognitive schema refer to perceptual filters that influence how individuals interpret information and often reflect knowledge about conditions, trends, and constituencies in their home country. Demeanor refers to outward physical behavior such as eye contact, punctuality, or conversational style. Language refers to the languages a person is likely to know or easily learn. According to this framework, the degree of diversity in a multinational group is determined by how close together or far apart the team members lie on these four dimensions. A group consisting of Norwegians and Swedes may be less diverse, for example, than a group consisting of Norwegians and Saudis. Diversity thus depends not only on the number of nationalities represented in the group but also on the distances between those nationalities. They further suggested that the effects of multinational diversity depend on whether the group's task is primarily creative, computational, or coordinative, and found that diversity posed the greatest difficulties for coordinative tasks.

Further extending these insights, Earley and Mosakowski (2000) found that homogeneous teams were most effective in the early stages of their formation because their shared identity facilitated effective communication. Using in-depth observations and interviews with five multinational teams as well as two laboratory studies, they also established that after developing ways to interact and communicate, highly heterogeneous teams were able to create a common identity, which in turn improved performance. In contrast, moderately heterogeneous teams had more difficulty communicating and low levels of team identity because members could join different factions, blocking the emergence of a hybrid team culture. Drawing on status hierarchy theories, they concluded that nationality is a primary status-determining characteristic within transnational teams.

Researchers have also addressed the influence of national differences that arise when multinational enterprises try to introduce team-based work arrangements in multiple countries. For example, Kirkman and Shapiro (1997) examined the effect of cultural values on employee resistance to globalized self-managing work teams. Drawing on Hofstede (1991), they suggested that individuals from some national cultures will be more intransigent than others because of perceptions of unfairness, among other reasons; however, the success of self-managed teams will depend on the extent to which organizations can effectively manage culture-based resistance to team-based work arrangements through the implementation of different forms of performance-appraisal processes, decision-making structures, and compensation systems.

While some studies have focused on national and cultural diversity, others have examined the influence of geographic diversity within transnational teams, often in conjunction with an emphasis on the impact of electronic rather than face-to-face communication. The premise of this research is

that the factors that influence the effectiveness of colocated teams (where members work in physically shared environments) may not be valid for distributed teams (where members are geographically dispersed). For example, Kiesler and Cummings (2002) showed how intragroup communication and knowledge-sharing efforts can be impeded in geographically dispersed teams where members can only communicate via electronic technologies. They suggested that voluntary collaboration is more likely when people are located in close proximity and drastically reduced when physical separation is introduced.

Like intragroup communication, trust and cohesion also may develop differently in distributed teams. Jarvenpaa and Leidner (1999) suggested that global virtual teams may experience a form of swift trust, but such trust appears to be very fragile and needs maintenance. In an effort to develop and support communication and cohesion among their geographically distributed team members, Maznevski and Chudoba (2000) found that effective global virtual teams generate a deep rhythm of face-to-face interactions that punctuate their periods of remote communication.

Conflict in distributed teams has been addressed by Mannix, Griffith, and Neale (2002), who suggested that distributed teams face greater risks of developing conflict than traditional teams due to their diversity and frequent lack of a shared social identity. They focused attention on the role of trust, a strong team culture, team efficacy, and team leadership in such situations. The emergence of conflict in distributed teams has also been highlighted by Polzer, Crisp, Jarvenpaa, and Kim (2006), who found that team members' geographic locations activated "faultlines" (hypothetical dividing lines that split a group into subgroups) that heightened conflict and reduced trust. These faultlines were stronger when a team was divided into two equally sized subgroups of colocated members and when these subgroups were homogeneous in nationality.

Finally, a recent study by Gibson and Gibbs (2006) offers an integration of the wide-ranging and sometimes inconsistent findings of research on virtual teams by addressing multiple characteristics of such teams simultaneously. Examining the effects of national diversity and geographic dispersion as well as electronic dependence and dynamic structure on team innovation, they found that these characteristics negatively influenced innovation, but the negative effects were mitigated by a psychologically safe communication climate within the team.

To summarize, scholars examining national, cultural, and geographic diversity in transnational teams have developed theoretically and practically significant insights into how the resulting intragroup processes can impede communication, trust, cohesion, and innovation. Research on transnational teams is limited by the typical focus on national, cultural, or geographic attributes, however, rather than characteristics that may be more closely related to the performance of knowledge-intensive work such as the level or type of expertise on the team.

This emphasis on diversity in characteristics removed from task requirements parallels a similar emphasis in the vast research on diversity in traditional teams, where scholars have focused mostly on the consequences of demographic diversity (e.g., sex, race, age, tenure) for intrateam processes (for a review, see Williams & O'Reilly, 1998). The research on demographic diversity in traditional teams is beginning, though, to examine knowledge acquisition and application more directly. This literature is marked by two competing views: one argues that demographic diversity introduces social divisions that impede coordination and hinder effective teamwork, while the other contends that diverse membership improves team performance through the learning benefits arising from their different contacts, skills, information, and experiences. In a reconciliation of these competing arguments, Reagans and Zuckerman (2001) suggested that a primary basis for such disagreement lies in assuming that demographic diversity proxies for knowledge exchanges by team members. While some studies expect homogenous teams to achieve higher performance due to a higher level of local interactions (network density), others expect diverse teams to perform better by bringing together members whose social networks offer access to diverse knowledge (network heterogeneity). The authors found that both network density and heterogeneity help account for team productivity, but demographic diversity has opposing effects on the two network variables, placing limits on managers' abilities to influence team outcomes by manipulating their demographic composition.

The importance of directly examining the knowledge that team members bring to their teams, rather than simply relying on their demographic characteristics, has also been addressed by recent research that focuses on expertise diversity in work teams, though again not transnational ones. Bunderson (2003) found that expertise recognition among team members was informed by specific as well as diffuse status cues (i.e., task-related characteristics as well as social categories such as race or gender), with task-related characteristics exhibiting much stronger effects. While specific status cues more strongly predicted perceptions of expertise in decentralized teams that were together for a long time, however, diffuse status cues were stronger predictors in centralized teams that were together for shorter durations. In a subsequent study, Van Der Vegt, Bunderson and Oosterhof (2006) found that in groups where members differed in their perceived expertise, members were more committed to and more likely to help those seen as more expert, a dynamic which frustrated intragroup learning and compromised performance.

As these recent directions indicate, scholars who study diversity in traditional teams are starting to recognize the value of directly examining the knowledge and expertise that individuals bring to their teams, rather than assuming that demographic differences necessarily determine knowledge contributions. However, the literature that addresses the unique challenges of transnational teams still focuses

mostly on team member characteristics that may not always accurately reflect differences in their knowledge contributions. For example, cultural, national, or geographic diversity may be outweighed by differences between team members originating from or situated in the same country who vary in their levels of expertise, cross-cultural communication skills, or degrees of international exposure (due to residence or education outside that country, parents or spouses of different nationalities, or job assignments, for example). In taking an exclusively internal perspective on team effectiveness, these literatures also have not addressed interactions between the members of transnational teams and their external environments that may influence their effectiveness, such as their knowledge-gathering activities. In contrast, research that takes an external perspective on teams has highlighted the importance of such team-environment interactions.

External Perspectives

An external perspective on teamwork in knowledgeintensive settings draws attention to how obtaining and using knowledge from sources outside the group can play a fundamental role in the effectiveness of teams and their organizations (Argote, McEvily, & Reagans, 2003). The early studies from this perspective investigated the role of boundary spanners-individual gatekeepers who connected their work units to other parts of the organization, serving as communication conduits for the flow of valuable technical information (e.g., Tushman, 1977). This approach was brought firmly into the domain of team effectiveness research by Ancona and Caldwell (1992), who conducted one of the first definitive multimethod field studies of cross-functional work group performance from an external perspective. Drawing on semistructured interviews and questionnaire surveys of new product development teams in high technology companies, they contended that organizational teams develop distinct communication strategies toward their environment. According to their findings, team performance is determined not only by the frequency of external communication but also by the pattern and type of communication activities in which teams engage, which include horizontal coordination and scanning as well as vertical communication efforts aimed at molding the views of senior managers.

More recently, Ancona, Bresman, and Kaeufer (2002) extended this research by coining the term "X-teams" to highlight the importance of designing externally oriented, adaptive teams in the face of rapidly changing work, technology, and customer demands. According to the authors, X-teams are distinguished from traditional teams by five hallmarks: external activities where members reach into the political, informational, and task-specific structures outside the team boundaries; extensive ties with insiders and outsiders of work groups forged in past professional experience; expandable membership structures that include a core tier

responsible for key decision making, an operational tier involved in ongoing work, and an outer tier engaged in specialized tasks separate from ongoing work; flexible membership that allows members to move in and out of the team during its life or across tiers within the team; and internal mechanisms for execution including integrative meetings, transparent decision making, and scheduling tools such as shared time lines. They suggest that X-teams are particularly valuable in multinational enterprises where there is high dependence on complex, dispersed, and rapidly changing information, as well as high interdependence among teams across the firm and a flat organizational structure.

Alongside the development of the external perspective in team effectiveness studies, a complementary approach has been taken in social network studies of task units within a firm. This approach is premised on the idea that knowledge from sources outside the team can be valuable because the unique social networks of diverse group members enable them to access nonredundant information and ideas. For example, Hansen (1999) reconciled contradictory views proposed by innovation researchers who argued that strong network ties are most effective for product innovation and social network researchers who contended that weak network ties are most beneficial, by suggesting that the strong tie research focused on knowledge-search activities whereas the weak tie research focused on knowledge-transfer activities. Examining both simultaneously, he found that neither weak nor strong ties between operating units always led to efficient sharing of knowledge among them. Instead, the impact of interunit ties on project completion time was contingent on the complexity of the knowledge to be transferred across subunits, with strong interunit ties most beneficial for highly complex knowledge and weak interunit ties most effective for less complex knowledge.

Scholars have also extended the above research on external team behaviors to include the use of knowledge from outside as well as inside organizational boundaries. For example, Collins and Clark (2003) demonstrated how the social networks of top management teams with their firms' employees (internal networks) as well as with actors outside their organization (external networks), may provide informational benefits and serve as a foundation for a firm's competitive advantage.

While research on external perspectives has been valuable in illuminating the link between team-environment interactions and team effectiveness, the majority of research in this tradition has focused on external knowledge without paying attention to the internal knowledge available within teams or the team member characteristics analyzed in studies that take an internal perspective (Joshi, 2006). The internal and external perspectives on teams thus are largely disconnected. Even more critically, very little of the research from an external perspective has focused on transnational teams specifically, leaving their distinctive opportunities and challenges largely unexplored. Consequently, our understanding of transnational teams in

knowledge-intensive organizations is still quite limited. To address these concerns, we consider the few studies that have focused specifically on knowledge acquisition and application by transnational teams in particular, with a view to highlighting the potential for integrating and extending some of the insights of prior studies and suggesting directions for future research.

Knowledge Acquisition and Application in Transnational Teams

Although still relatively rare, some studies that examine transnational teams from an internal perspective have moved beyond the surface level of national, cultural, or geographic diversity to examine knowledge utilization directly, often using qualitative methods. In a study of 13 project teams dispersed among 9 universities across 3 continents, Cramton (2001) investigated the impediments to collaboration that arise from failures of "mutual knowledge," knowledge that the team members share in common and know they share. These impediments include failure to communicate and retain contextual information, difficulties understanding the salience of information, and differences in the speed of access to information. The implication is that a lack of mutual knowledge in transnational teams makes communication not only less likely to occur but also less likely to be understood when it does occur. Exploring similar themes, Sole and Edmondson (2002) conducted an indepth qualitative field study of learning and collaboration in 7 geographically dispersed cross-functional project teams in a multinational company that designed and produced polymer products. They found that these teams benefited from their access to locale-specific knowledge resources, but struggled to recognize and apply such "situated knowledge" in the absence of team members with appropriate local experience.

From an external perspective, the distinctive challenges faced by teams in multinational settings have been addressed in a study of 121 new product development projects in a multinational high-technology company. Examining the transfer of technological competencies to these project teams from potential target subsidiaries, Hansen and Lovas (2004) found that transfers of information and know-how related to hardware and software development generally were more likely if the target subsidiary had related competencies, was geographically close, had a prior relationship with the transferring team, and belonged to the same formal subgroup. The interactions between these factors were complex, however; transfers of related competencies were deterred by geographic distance, for example, while the barrier of distance could be overcome by the existence of informal ties.

Despite the growing interest in examining the acquisition and application of knowledge by transnational teams among both internally focused and externally focused researchers, studies that integrate internal and external perspectives remain rare. In one study that moves in this direction, Cummings (2004) examined the benefits of both internal and external knowledge in a sample of 182 project teams in a Fortune 500 telecommunications company. Drawing on the social network argument that nonredundant knowledge can be more valuable than redundant knowledge, he argued that teams will benefit more from obtaining external knowledge if they have greater "structural diversity," defined as the different affiliations, roles, or positions members hold within the organization. The results revealed that more diverse geographic locations, functional assignments, reporting managers, and business unit affiliations increased the benefits of external knowledge for the team, but did not increase the benefits of internal knowledge. Demographic diversity did not influence the benefits of either external or internal knowledge. The implication is that sources of team member diversity that contribute to their ability to provide unique and helpful knowledge to the team can prove more valuable than sources of diversity that have only limited relevance, if any, for their ability to acquire and apply valuable knowledge.

A similar theme was developed in a study by Haas (2006) that addressed both internal and external knowledge use by taking a different approach to understanding the diverse roles that members can play in their teams. This study introduced a classification scheme that categorized team members according to their global and local experiences, rather than their national, cultural, or geographic attributes, by distinguishing between "cosmopolitans" (team members with who have lived and worked in several countries and speak multiple languages) and "locals" (team members who have lived and worked in the project country and speak the local language). The argument is that cosmopolitans and locals can play different roles in acquiring and applying global technical knowledge and local country knowledge in transnational teams. Analyzing 96 project teams at an international development agency, the study revealed that cosmopolitans brought more technical knowledge to their teams when they joined whereas locals brought more country knowledge; cosmopolitans also gathered more external knowledge during the project. Beyond knowledge acquisition, cosmopolitans and locals also played different roles in knowledge application, sometimes helping but sometimes hurting their teams' efforts to transform internal and external knowledge into high-quality projects. The findings thus showed that the roles played by cosmopolitans and locals in acquiring and applying technical and country knowledge for their teams were important but complex, as cosmopolitans offered greater benefits than locals while both cosmopolitans and locals could sometimes hurt rather than help team performance. Overall, a combination of cosmopolitan and local members may best equip a team to meet the strategic mandate to "think global, act local" in its everyday project work.

In summary, the recent research on transnational teams in knowledge-intensive organizations suggests that there are useful new insights to be gained by focusing directly on the task-relevant processes to be undertaken by team members, such as knowledge acquisition and application, and examining the characteristics and conditions that enable them to undertake these processes more effectively, such as their levels of expertise, structural diversity, or cosmopolitan and local composition. Further exploration of these promising directions in future research is particularly important in light of the macrolevel strategic and structural imperatives facing multinational enterprises that must think globally while acting locally, since transnational teams carry out many of the critical tasks of these organizations.

CONCLUSIONS AND FUTURE DIRECTIONS

The research literature provides solid foundations for understanding the consequences of national, cultural, and geographic diversity for transnational teams, as well as the implications of demographic diversity for work teams generally. Studies of internal team processes as well as external team activities also increasingly highlight the importance of accessing and applying knowledge. Relatively little attention has been given to date, however, to integrating the themes of transnational team characteristics, knowledgerelated processes, and task outcomes. Yet at this intersection lies the core of the challenge facing multinational enterprises that are striving to deliver superior projects, products, and services: to draw on best practices and lessons learned from around the world while customizing them to the local country environment. A wealth of opportunities thus exists for future research to develop a more comprehensive understanding of the effects of transnational team characteristics and processes for effective performance of knowledge-intensive work.

First, there are opportunities to integrate the dominant research perspectives with less commonly used ones in order to produce richer, more deeply contextualized insights into knowledge-intensive work in transnational teams. Most of the studies described above implicitly assume that managerial interventions can be harnessed to successfully design work groups in ways that will improve team performance. Others explicitly examine how human resource practices, for example, can more effectively support transnational teams (e.g., Snell, Snow, Davison, & Hambrick, 1998). While useful, these assumptions of managerial rationality and discretion usually overlook the insights of critical sociological perspectives that highlight the conflicts, coercion, status contests, and self-regulation which often emerge within and between work groups (e.g., Barker, 1993; Haas, 2005; Sewell, 1998). It may be productive to incorporate such alternative viewpoints to better explain the functioning of transnational teams in their complex organizational settings while retaining the insights of rational-managerial perspectives. For instance, our understanding of transnational teams across organizational and industry contexts may be

supplemented by political perspectives that draw attention to the influence attempts that often accompany knowledge flows, as well as by institutional perspectives that highlight the tendency to imitate others for reasons of legitimacy.

Second, cross-level interactions among the individual, group, and firm levels of analysis can be explored in order to better understand how each influences the others. A central contention of this chapter is that it is valuable to explore the firm-level strategic and structural challenges posed by the need to "think global, act local" by looking to grouplevel characteristics, processes, and outcomes. The core of this argument is that understanding the sources of performance variation among transnational teams offers important insights into the determinants of critical task outcomes that influence the performance of multinational enterprises. Examining group-level variation enables researchers to control for many possible influences on performance that arise from the shared organizational environment, and isolate the factors that distinguish more effective teams from less effective ones. Despite its advantages, though, this approach raises its own set of questions concerning the aggregation of group-level outcomes to the firm level. It cannot be assumed that better team performance will always contribute to an improvement in firm performance because teams are embedded in complex contexts that can enhance or limit their contributions. Given that better performance at one level may not necessarily translate into improved performance at another level, future research could benefit from efforts to span, integrate, and explore the tradeoffs between different levels of effectiveness, including performance outcomes at the individual, group, and firm levels.

The multilevel dynamics are likely to be particularly complex because a team's effectiveness is not independent of other teams in an organizational setting, suggesting that overall organizational effectiveness will be influenced by intergroup relationships. Future research on transnational teams can investigate the twin sides of relational dynamics in organizations: cooperation and competition. For example, teams often build positive relationships with influential external parties while at the same time suffering from negative relationships that threaten to sabotage their efforts. They also experience tensions when building cooperative relationships with colleagues and other teams while simultaneously competing with them for resources and rewards. By addressing the cooperative and competitive relationships among transnational teams, more realistic and dynamic insights into the nature and challenges of their work can be developed.

In conclusion, it will be productive for future research on transnational teams in knowledge-intensive organizations to combine otherwise unconnected approaches from different perspectives to produce integrative explanations. This mandate is necessitated by the complexity of the phenomenon; transnational teams are not temporary groups established for laboratory experiments, routine work teams that carry out straightforward tasks, or even stable self-

managed teams engaged in nonroutine work. Instead, they are often nationally and culturally diverse, geographically dispersed, structurally dynamic, dependent on electronic forms of communication, and composed of members with different experiences, expertise, and orientations. Interdisciplinary, cross-paradigm, and multilevel approaches thus are essential for increasing our understanding of the relationships between the characteristics, processes, and outcomes of transnational teams in knowledge-intensive organizations.

REFERENCES AND FURTHER READINGS

- Adler, N. J. (1986). *International dimensions of organizational behavior*. Cincinnati, OH: South-Western.
- Ancona, D. G., Bresman, H., & Kaeufer, K. (2002). The comparative advantage of X-teams. *Sloan Management Review*, 43, 33–39
- Ancona, D. G., & Caldwell, D. F. (1992). Bridging the boundary: External activity and performance in organizational teams. *Administrative Science Quarterly*, *37*, 634–665.
- Argote, L., McEvily, B., & Reagans, R. (2003). Introduction to the special issue on managing knowledge in organizations. *Management Science*, 49, v–viii.
- Barker, J. R. (1993). Tightening the iron-cage: Concertive control in self-managing teams. Administrative Science Quarterly, 38, 408–437.
- Barney, J. (1991). Firm resources and sustained competitive advantage. *Journal of Management*, 17, 99–120.
- Bartlett, C. A., & Ghoshal, S. (1989). *Managing across borders:*The transnational solution. Boston: Harvard Business School
 Press
- Bunderson, J. S. (2003). Recognizing and utilizing expertise in work groups: A status characteristics perspective. Administrative Science Quarterly, 48, 557–591.
- Collins, C. J., & Clark, K. D. (2003). Strategic human resources practices, top management team social networks, and firm performance. Academy of Management Journal, 46, 740– 751.
- Cramton, C. D. (2001). The mutual knowledge problem and its consequences. *Organization Science*, *12*, 346–371.
- Cummings, J. N. (2004). Work groups, structural diversity, and knowledge sharing in a global organization. *Management Science*, *50*, 352–364.
- Earley, P. C., & Mosakowski, E. (2000). Creating hybrid team cultures: An empirical test of transnational team functioning. *Academy of Management Journal*, *43*, 26–49.
- Gibson, C. B., & Gibbs, J. L. (2006). Unpacking the concept of virtuality: The effects of geographic dispersion, electronic dependence, dynamic structure, and national diversity on team innovation. Administrative Science Quarterly, 51, 451–495.
- Grant, R. M. (1996). Prospering in dynamically competitive environments: Organizational capability as knowledge integration. *Organization Science*, 7, 375–387.
- Gupta, A. K., Govindarajan, V. (2000). Knowledge flows within multinational corporations. *Strategic Management Journal*, 21, 473–496.
- Haas, M. R. (2005). Cosmopolitans and locals: Status rivalries, deference, and knowledge in international teams. In M. C.

- Thomas-Hunt, E. A. Mannix, & M. A. Neale (Eds.), *Research on managing groups and teams: Status and groups* (Vol. 7, pp. 201–227), Oxford, UK: Elsevier.
- Haas, M. R. (2006). Acquiring and applying knowledge in transnational teams: The roles of cosmopolitans and locals. *Orga*nization Science, 17, 367–384.
- Hambrick, D. C., Davison, S. C., Snell, S. A., & Snow, C. C. (1998). When groups consist of multiple nationalities: Towards a new understanding of the implications. *Organization Studies*, 19, 181–205.
- Hansen, M. T. (1999). The search-transfer problem: The role of weak ties in sharing knowledge across organization subunits. Administrative Science Quarterly, 44, 82–111.
- Hansen, M. T., & Lovas, B. (2004). How do multinational companies leverage technological competencies? Moving from single to interdependent explanations. *Strategic Management Journal*, 25, 801–822.
- Hofstede, G. (1991). Cultures and organizations. Berkshire, UK: McGraw-Hill.
- Jarvenpaa, S. L., & Leidner, D. E. (1999). Communication and trust in global virtual teams. *Organization Science*, 10, 791– 815.
- Joshi, A. (2006). The influence of organizational demography on the external networking behavior of teams. Academy of Management Review, 31, 583–595.
- Kiesler, S., & Cummings, J. (2002). What do we know about proximity and distance in work groups? In P. Hinds & S. Kiesler (Eds.), *Distributed work*. Cambridge, MA: MIT Press.
- Kirkman, B. L., & Shapiro, D. L. (1997). The impact of cultural values on employee resistance to teams: Toward a model of globalized self-managing work team effectiveness. *Academy* of Management Review, 22, 730–757.
- Kogut, B., & Zander, U. (1993). Knowledge of the firm and the evolutionary theory of the multinational corporation. *Journal* of *International Business Studies*, 24, 625–645.
- Liebeskind, J. P. (1996). Knowledge, strategy and theories of the firm [Special issue]. Strategic Management Journal, 17, 93–107.
- Mannix, E. A., Griffith, T., & Neale, M. A. (2002). The phenomenology of conflict in distributed work teams. In P. Hinds & S. Kiesler (Eds.), *Distributed work*. Cambridge, MA: MIT Press.
- March, J. G., & Simon, H. A. (1958). *Organizations*. New York: John Wiley & Sons.
- Maznevski, M., & Chudoba, C. (2000). Bridging space over time: Global virtual team dynamics and effectiveness. *Organization Science*, 11, 473–492.
- Nohria, N., & Ghoshal, S. (1997). The differentiated network: Organizing multinational corporations for value creation. San Francisco: Jossey-Bass.
- Polzer, J. T., Crisp, C. B., Jarvenpaa, S. L., & Kim J. W. (2006). Extending the faultline model to geographically dispersed teams: How colocated subgroups can impair group functioning. Academy of Management Journal, 49, 679–692.
- Prahalad, C. K., & Doz, Y. L. (1987). *The multinational mission*. New York: Free Press.
- Reagans, R., & Zuckerman, E. W. (2001). Networks, diversity, and productivity: The social capital of corporate R&D teams. *Organization Science*, *12*, 502–517.
- Sewell, G. (1998). The discipline of teams: The control of the team based industrial work through electronic and peer surveillance. *Administrative Science Quarterly*, 43, 397–428.

- Snell, S. A., Snow, C. C., Davison, S. C., & Hambrick, D. C. (1998). Designing and supporting transnational teams: The human resource agenda. *Human Resource Management*, 37, 147–158.
- Sole, D., & Edmondson, A. (2002). Situated knowledge and learning in dispersed teams. *British Journal of Management*, 13, 17–34.
- Tushman, M. (1977). Special boundary roles in the innovation process. *Administrative Science Quarterly*, 22, 587–605.
- Van Der Vegt, G. S., Bunderson, J. S., & Oosterhof, A. (2006). Expertness diversity and interpersonal helping in teams: Why

- those who need the most help end up getting the least. *Academy of Management Journal*, 49, 877–893.
- Wernerfelt, B. (1984). A resource-based view of the firm. *Strategic Management Journal*, 5, 171–180.
- Williams, K. Y., & O'Reilly, C. A. (1998). Demography and diversity in organizations: A review of 40 years of research. *Research in Organizational Behavior*, 20, 77–140.
- Williamson, O. E. (1975). Markets and hierarchies: Analysis and antitrust implications. New York: Free Press.

CONFLICT MANAGEMENT IN WORK TEAMS

HELENA SYNA DESIVILYA

Max Stern Academic College of Emek Yezreel

onflict constitutes an inevitable and commonplace element of social life. Hence, it is highly prevalent in the organizational arena (De Dreu & Van de Vliert, 1997) and is a significant element in the dynamics of organizational work teams. Members of work groups and teams within organizations experience and manage conflict with their counterparts on an everyday basis.

Work teams as increasingly popular organizational structures serve to improve quality, increase efficiency, and ensure organizational sustainability. Effectiveness in group functioning depends to a large extent on the strength of the relationships within the team (such as trust in team members), which, in turn, nourish the nature of their internal interactions (Tjosvold, West, & Smith, 2003). Scholars in the area of organizational behavior and management have argued that the quality of work team interpersonal bonds is significantly affected by the group's ability to manage conflicts. Moreover, the organizational reality of a highly diverse work group composition increases the propensity for intragroup conflicts, thus turning effective dispute management into a vital asset.

Modes of handling disagreements in work teams constitute critical determinants of conflict outcomes (De Dreu, 2006). Conflict can be harmful if managed destructively, adversely affecting the quality of teams' decisions, as well as their productivity, innovation, and members' satisfaction. Conversely, constructive ways of handling conflicts provide an opportunity for surfacing problems, tracing mutually beneficial solutions, enhancing motivation to engage interpersonal tensions, and eventually, reaffirming team members' confidence in intrateam relations and fostering team performance.

Research on conflict management in work teams has proceeded in two main directions. One direction has focused on

conflict types and their associations with conflict outcomes (De Dreu & Weingart, 2003b; Jehn, 1997), while the other has evolved around the dynamics of conflict management (Alper, Tjosvold, & Law, 2000; Ayoko, Härtel, & Callan, 2002; Desivilya & Eizen, 2005), attempting to distinguish constructive conflict management processes from their destructive counterparts.

This chapter attempts to review and integrate findings derived from both streams of research. It is aimed to elucidate major patterns of managing conflict in work teams, focusing on the bipolar constructive-destructive dimension and its determinants. First, the nature of conflicts in work teams and their antecedents will be explored. Then the dynamics of conflict management will be explicated. Next, outcomes of conflicts in work teams will be addressed, as related to the types of conflicts and patterns of handling internal disputes. Finally, future research directions and applications to team management will be discussed.

The chapter is based on a review of interdisciplinary research, thus representing various methodologies, including experimental studies and both quantitative and qualitative field research.

THE NATURE OF CONFLICTS IN TEAMS AND THEIR ANTECEDENTS

As indicated earlier, conflict constitutes one of the rudimentary processes in teams. De Dreu and Weingart (2003a) defined intragroup conflict as a process emanating from interpersonal tensions among team members owing to real or perceived disparities. Inputs of team members and their interactions in work teams involve both social

and mission-related aspects. Hence, conflict processes may touch upon task and relationship issues. Accordingly, Jehn (1997) distinguished between relationship (or affective) and task (or cognitive) conflict and developed separate definitions of these two concepts. Relationship (affective) conflict refers to an awareness of interpersonal incompatibilities, reflecting interpersonal frictions; tensions; clash of personalities; and disagreements about personal values, taste, and interpersonal styles. This type of conflict is associated with the emotional aspects of interpersonal relations in work teams. Task (cognitive) conflict pertains to an awareness of differences in opinions and perspectives with respect to the work team's tasks, entailing divergent perceptions concerning distribution of resources, work procedures, and policies. In contrast with the emotionally driven relationship conflict, this type of intrateam discord is embedded in the substantive elements of teams' tasks, and is thus viewed by some scholars as more intellectual in nature.

In addition to elucidating the characteristics of conflicts, scholars of organizations and management have investigated the triggers of relationship and task conflicts in work teams. Among a variety of potential antecedents, diversity and team's geographical arrangements—collocated versus distributed—are noteworthy.

Diversity as a Trigger of Conflicts in Work Teams

Diversity denotes variation in a wide range of team members' characteristics, including professional background and expertise, tenure, and salient demographic features such as age, gender, race and ethnicity. Mohammed and Angell (2004) distinguished between surface-level and deep-level diversity. Surface-level diversity refers to the extent of demographic variation in a work unit, whereas deep-level diversity purports to disparities in personality, attitudes, and values.

Both quantitative and qualitative studies of work teams provided substantial evidence that members of groups characterized by high levels of diversity experience more conflicts than their counterparts in homogeneous groups do. This finding referred primarily to the relationships between surface-level diversity and relationship conflict, showing that greater demographic diversity was associated with more relationship conflict. Members of heterogeneous work teams experienced interpersonal tensions due to cultural differences reflected in divergent beliefs and values. Researchers have attempted to explain the triggering effect of surface-level diversity on relationship conflict drawing on Tajfel's and Turner's (1986) social identity and social categorization theories and Byrne's (1997) similarity-attraction paradigm. The basic tenet of the social categorization and social identity conceptual framework posits that people tend to define and distinguish themselves from others based on their group membership. Encountering individuals from different groups sets up the categorization process and gives rise to a tendency to form a more favorable image of one's own group in comparison to the attitudes toward individuals from dissimilar groups. This process allows individuals to protect and maintain positive social identity.

The similarity-attraction paradigm offers a different explanation to the biased tendency to favor members of one's own group over "outsiders." According to this model, people are more attracted to and prefer to interact with similar individuals because they expect thereby to reaffirm their values and beliefs. Notwithstanding the differences in the theoretical approaches, both explanations point to the same outcome of *in-group favoritism*, which accentuates preexisting stereotypes and prejudice, and enhances antagonism between diverse team members, thus increasing the odds of relationship conflicts.

Mohammed and Angell (2004) extended prior research directions on the relationships between diversity and conflict in work teams. They studied the effects of two types of diversity—surface-level (variation in gender and ethnicity) and deep-level (variation in a personality characteristic of extraversion and in perceptions of time urgency)—on relationship conflict in ad hoc teams composed of business students working on a project over a period of several months. The researchers included additional variables that could potentially moderate the negative effect of diversity on relationship conflict in the study. Among these factors was team orientation, namely, an individual's preference and feeling comfortable working in groups, which was expected to mitigate the effects of surface-level diversity and group processes (communication, cooperation, and leadership) presumably attenuating the adverse impact of deep-level diversity. In line with the hypothesis, team orientation mitigated the adverse influence of gender diversity on relationship conflicts, making team members less bothered by relationship conflict in spite of gender differences. In a similar vein, effective team processes attenuated relationship conflict triggered by deep-level diversity. The study also indicated that the effects of both types of diversity on conflict decreased over time. Conceivably, team members have learned how to deal with conflict; alternatively, in order to avoid relationship conflict, they minimized contact and interactions with diverse individuals in the work group.

Other scholars further refined the diversity and conflict links, using the notion of *faultline* (Lau & Murnighan, 1998). This concept refers to hypothetical dividing lines that split a group into subgroups and give rise to polarization between in-group and out-group identities. Faultlines may be activated by a single salient attribute in a specific context—for example, age in dealing with issues of pensions; parent company affiliations in joint ventures; race, ethnicity, or gender while dealing with affirmative action; or nationality when transnational teams meet face-to-face. An underlying premise of the faultline model states that the intergroup dynamic between socially diverse *subgroups* yields stronger effects on conflict than the intergroup dynamic between *individuals* from different social groups yields.

Polzer, Crisp, Jarvenpaa, & Kim (2006), who studied 45 teams of graduate students in 10 countries, showed that location served as a characteristic stimulating faultlines, thus engendering conflicts in work teams and reducing trust among team members. The next section addresses the role of work groups' geographical arrangements in producing conflicts in work teams. Distributed teams will be compared with their collocated counterparts.

Work Groups' Geographical Arrangement as an Antecedent of Conflicts in Work Teams

Geographically dispersed teams have become an increasingly prevailing work group arrangement, capturing the attention of organization scholars. Some of this work revolved around group dynamics, especially conflict processes in such teams as contrasted with their collocated counterparts. Research findings have indicated that the former experienced more relationship and especially task conflicts than the latter experienced. This result can be partially explained by the lack of shared identity in geographically distributed teams, which erodes trust and a sense of loyalty toward distant team members, leading instead to interpersonal tensions among geographically separated team members—namely, to relationship conflict.

Greater propensity for task conflict in distributed teams in comparison to collocated teams was attributed to paucity of shared context—namely, standardized work processes, tools, and systems. Lack of shared work procedures precipitates misunderstandings and divergence in approaches and interferes with coordination efforts, thus enhancing task conflict in distributed teams.

Both shared identity, which may moderate relationship conflict, and shared context, which may attenuate task conflict, require spontaneous information exchange among team members. Such open communication processes appear more problematic in distributed than in collocated teams.

Based on a study of research and development teams in two U. S. states, Hinds and Mortensen (2005) showed that open communication channels may enhance the salience of shared identity by highlighting similarities and joint concerns. Shared identity, in turn, strengthens psychological bonds between distant members, thus moderating relationship conflict. In a similar vein, open and spontaneous communication helps to clarify common work procedures, thereby contributing to shared context, which then mitigates task conflict. The researchers have also found that open information exchange has an independent moderating effect on the relationships between geographical distribution and conflict; it helps to identify conflict as well as to handle it.

Comparison between distributed and collocated teams revealed that distributed teams benefit more from spontaneous communication than their collocated counterparts do. Presumably, distributed teams are more vulnerable to conflict and especially to its escalation; hence, they may need more active approach to conflict detection and management.

As indicated earlier, conflicts in work teams constitute prevalent experiences of team members. Thus far, we have illuminated the nature of this frequent phenomenon in work groups, presenting two major types of conflicts—relationship conflict and task conflict—and some of their main antecedents, such as team diversity and geographical distribution.

Discords in work teams can be harmful if managed destructively, leading to poor outcomes such as impaired decisions, low productivity, little innovation, members' dissatisfaction, and impoverished well being. Conversely, constructive ways of dealing with conflicts may help recognize interpersonal problems in work teams, facilitate tracing mutually beneficial solutions, boost motivation to engage interpersonal tensions, build interpersonal trust, and improve team performance.

How do work teams manage the everyday reality of internal conflicts? The next part of this chapter moves to explore the dynamics of conflicts in work teams: various approaches to managing internal discords and their developmental course while emphasizing the distinction between constructive and destructive processes.

THE DYNAMICS OF CONFLICT MANAGEMENT: CONSTRUCTIVE VERSUS DESTRUCTIVE PROCESSES OF COPING WITH CONFLICTS IN WORK TEAMS

This chapter follows the fundamental assumption—advanced by conflict and organization scholars—that effectiveness of work teams stems to a large extent from the quality of their internal relationships. Team members' approach and the actual ways they handle internal conflicts have a considerable impact on the attributes of their internal bonds. Hence, thorough understanding of orientations, approaches, and actual conflict management behaviors in work teams is deemed to be essential.

In an attempt to elucidate the dynamics of conflict in work teams, we first delineate several prevailing conceptual frameworks analyzing conflict management and stressing their application in research on work teams. Then we proceed to explicate the factors governing the choice of various conflict handling patterns, highlighting the antecedents of constructive in contrast with destructive conflict management processes.

Approaches to Conflict Management

Conflict management refers to behaviors team members employ to deal with their real and perceived differences, some relating to emotionally driven conflicts (relationship conflicts) and others addressing the more substantive elements of their discords (task conflicts). Most studies on interpersonal conflict management patterns have adopted the Dual Concern Model, originally proposed by Blake and Mouton (1964) later adopted with some modifications by

several scholars: Pruitt and Rubin (1986), Rahim (1983), and Thomas (1976). The basic tenet of this model postulates that the conflict management mode employed by an individual emanates from two underlying motives: concern for self and concern for the other party. The strength of each of these two motivational orientations according to conflict scholars may vary as a function of the particular conflict situation, with differing emphases on each of the two concerns yielding five major conflict management patterns: (a) dominating (high concern for self and low concern for the other), reflected in attempts to persuade the other side to accept one's position, or use of more extreme means in coercing the other to give in, such as harassing the other, making threats and positional commitments—that is, posing ultimatum; (b) obliging (low concern for self and high concern for the other), manifested in behaviors such as acquiescence with the other and admitting one's own mistakes; (c) avoiding (low concern for self and low concern for the other)—that is, evading confrontation of the conflict issues, illustrated by reactions such as changing the subject of the conversation and refraining from contact with the counterpart; (d) integrating (high concern for self and high concern for the other), reflected in exchange of information concerning interests and priorities, searching mutually beneficial alternatives for solution, and providing constructive feedback to the other's suggestions; and (e) compromising (moderate concern for self and moderate concern for the other, in Rahim's version of the model), manifested in behaviors such as seeking and proposing midway solutions.

Desivilya and Eizen (2005) proposed an integrated conceptual framework designed to portray conflict management in work teams. It incorporates the specific conflict management strategies that emerged from the Dual Concern Model with elements of the theoretical frameworks derived from research on conflict in close relationships (Fincham, 2003; Rusbult, 1993). The patterns identified in these studies captured two fundamental dimensions of dispute management: engagement-avoidance and constructiveness-destructiveness. Conflict engagement entails overt confrontation of conflict issues, whereas avoidance reflects evasion rather than directly addressing conflict issues. The engagement style of conflict management is exemplified by statements of personal criticism, threats, disclosing information about oneself, and suggesting potential solutions of the problem, while avoidance is demonstrated by changing topics for discussion or postponing discussion.

The other global dimension of conflict approach pertains to the potential outcome of conflict management behavior—namely, whether it is constructive or destructive to the relationship between the partners (or group members). Constructive actions reflect cooperative and prosocial behavior aimed at preserving relationships. In contrast, destructive behavior is denoted by antisocial, competitive behavior that is potentially disruptive to the relationship or that reduces the odds of repairing the bonds.

Joining components of the dual concern model with the bidimensional model identified in the close relationships context allows a wider representation of individual choices in handling intrateam conflicts. The integrated model comprises five patterns according to which individual members may manage intrateam conflicts: (a) dominance (engagingdestructive); (b) integration (engaging-constructive); (c) compromising (engaging-moderately constructive); (d) obliging (avoiding-constructive); and (e) avoidance (avoiding-destructive). The obliging and avoidance patterns (which are low on concern for self) constitute reactions of avoiding intrateam conflict situations, in contrast with the dominance, integrating, and compromising patterns (high to moderate on concern for self), which entail conflict engaging behaviors. With respect to the second global dimension (constructiveness-destructiveness), the consequences of the dominating and avoiding patterns (low on concern for others) are presumably more destructive to the relationships among the team members in comparison to the potentially constructive ramifications of the integrating, compromising, and obliging patterns (high to moderate on concern for others).

Tjosvold (1993, 2006) has embraced a somewhat different theoretical approach in his extensive program of research on conflict in work teams. It rests on the fundamental assumption, advanced by Morton Deutsch (1973), that individuals' perceptions about the ways their goals are related to those of their counterparts govern their approach and actual interactions in conflict situations. According to this conceptual perspective, individuals may then communicate to the other party either cooperative or competitive intentions. Thus, if they believe that their own goals are positively linked to the goals of the other side, they will most likely adopt the cooperative conflict management strategy, allowing all the parties to pursue and attain their goals. A belief in positive association among the parties' goals means that all participants involved in the conflict situation can win or be successful in their attempts to resolve the conflict in a mutually satisfactory way. Conversely, if protagonists involved in a conflict situation view their goals as negatively associated—namely, if they perceive that accomplishing the goals by one party makes the counterparts less likely to attain their goals—they will tend to embrace the competitive strategy. In other words, such a "zero-sum" orientation precipitates use of tactics designed to outdo the other, or fosters attempts to win at the other party's expense or loss.

Ayoko et al. (2002) proposed a similar dichotomous typology of managing conflicts in work groups, focusing mainly on communication patterns that shape members' interactions in teams. According to these scholars, cooperative approach to conflict is reflected in attempts to communicate with the other team members in ways that promote convergence and inclusion in their interpersonal interactions. Efforts to use common language, clarifying the meaning of messages and discussing familiar topics, illustrate such cooperative tendencies. By contrast, divergent communication designed to exclude some team members from interpersonal interactions represents competitive

orientation to conflict management, demonstrated by use of specific dialect or accent, talking about unfamiliar subjects, and reluctance to provide clarification.

Although the typologies presented above differ in terms of their theoretical emphasis, with the first two (the dual concern model and the integrated version) stressing the motivational underpinnings of approaches to conflict management, Tjosvold's (1993, 2006) underscoring the individuals' beliefs (cognitions) concerning the parties' goal structure and Ayoko et al. (2002) highlighting the communication tendencies, they share the distinction between constructive and destructive orientations. The former entails concern about the team's internal relations, and therefore, efforts to promote mutual understanding, interpersonal attitudes, trust, and the ability to work together at present and in the future. By contrast, destructive orientation involves lack or minimal concern about the internal bonds, negative mutual attitudes among team members, and difficulties at coordinating members' efforts that is low capacity for joint work. We now turn to address the potential precursors of these two distinct approaches to conflict management, based on existing research findings.

Antecedents of Conflict Management Patterns in Work Teams

Relatively limited number of studies examined the processes of conflict management and their antecedents in work teams. Ayoko and associates' (2002) qualitative study on business students' teams constitutes one pertinent example. It is noteworthy that most of these scholars' results were cross-validated by data collected through three methods—(a) observations, (b) interviews, and (c) self-report questionnaires—thus affording greater confidence in the findings.

These researchers showed that cultural diversity affected the way that team participants approached conflict. Members who constituted the cultural mainstream tended to ignore and exclude their minority counterparts from intrateam interactions, especially at the initial phases of the group process. Such exclusive communication patterns were reflected in interruptions of the minority members' speech, their exclusion from turn taking, and not maintaining eye contact with them. The minority team members themselves refrained from participation owing to fear and insecurity about their language proficiency. Thus, members of the majority exhibited competitive tactics associated with destructive conflict management while members of the minority accommodated their behavior accordingly by withdrawing from intrateam interaction. At later stages of the group process, more constructive interactions between minority and majority members have developed, particularly if team leaders who were capable of managing discourse and reinstating disrupted and deteriorated communications emerged.

Ayoko and associates' (2002) research also indicated that members of heterogeneous groups frequently resorted

to conflict avoidance in order to ease tensions and prevent conflict escalation. Evading direct confrontation was designed to reverse the destructive conflict course and instead foster constructive conflict dynamics.

Hinds and Mortensen's (2005) study on multinational research and development teams pointed at another mechanism of halting conflict escalation, which was effective in geographically distributed work groups. This entailed spontaneous communication that, in turn, fostered perceptions of shared identity and promoted information exchange designed to develop shared work procedures. Both shared identity and better understanding of common work procedures allowed team members to recognize conflicts and cope with intragroup tensions prior to escalation of the destructive dynamics.

The findings obtained in research on particular kind of teams—high on the diversity dimension and geographically dispersed—allude to more general precursors of conflict management in work teams, which can be classified into two major categories: one related to emotional aspects (e.g., associated with social identity) and the other linked with cognitive aspects (e.g., level of common understanding of other team members, work procedures, and etc.). Such a categorization leads back to the relationship conflict and task conflict distinction. Indeed, several studies examined the association between these two conflict types and conflict management patterns in work teams. Rentsch's and Zelno's (2003) work constitutes a significant contribution to our knowledge concerning the role of conflict type in preferences of conflict management modes.

These researchers studied intrateam dynamics in work groups, where members perform complex, unstructured tasks such as strategic decision making. According to their theoretical perspective, team members' interpretations of their counterparts' action-related intentions markedly influence conflict behavior in work teams. As such Rentsch and Zelno's (2003) conceptual framework converges with Tjosvold's (1993, 2006) typology presented earlier, which also views intrateam conflict management as derived from members' perceptions about the structure of their goal-interdependence. Competitive and cooperative intentions communicated to team members therefore constitute critical factors in directing the conflict course.

Following this line of reasoning, Rentsch and Zelno (2003) have focused on the congruence among team members' cognitions. Specifically, they have argued that greater correspondence among team members' interpretations of action intentions (especially about positive team orientation) fosters more effective and efficient conflict management interactions. Such congruent cognitions enhance mutual understanding among team members, encourage convergent and inclusive communication, and foster successful coordination. Consequently, divergent views about work procedures and other work-related issues (task conflict) will most likely be considered as legitimate disagreements, which need to be addressed in a cooperative manner, seeking mutually acceptable solutions. Conversely, if team

members' perceptions reveal incongruent views of actionrelated intentions, such as when some of them erroneously construe task conflict as relationship conflict (e.g., interpret constructive criticism directed at them as personal attacks), adoption of competitive conflict management strategy will be more likely. Such contentious approach may reflect various adverse tactics designed to undermine the others' actions, including personal attacks directed at other team members.

Beyond incidental use of contentious tactics, inaccurate and incongruent cognitions of team members can incite destructive conflict course. This is especially likely when team members repeatedly misattribute the others' behaviors and view them as interfering with the team's goals and norms. Such destructive escalatory dynamics discourages intrateam information exchange and increases the likelihood of power struggles. By contrast, constructive dynamics of handling intrateam conflicts is more likely to develop when team members hold congruent perceptions about the positive value of openness and constructive controversy in promoting the group's goals. In the latter case, they tend to treat internal discords as task conflicts rather than emotionally colored personal incompatibilities. Task conflicts, unlike their affective (relationship) counterpart, encourage cooperative strategic choice designed to foster attainment of work team goals and strengthen the internal bonds among team members.

De Dreu's (2006) and Desivilya and Yagil's (2005) research provide some support to Rentsch and Zelno's (2003) arguments with regard to the relationships between the nature of conflict and the ways it is managed. Empirical evidence derived from studies on work teams has indicated that affective (relationship) conflict mitigates the use of cooperative strategies such as collaborative problemsolving behaviors and precipitates adoption of contentious and coercive strategies.

Another approach to study the antecedents of conflict management in work teams is based on the distinction between variables referring to personal characteristics of team members and variables purporting to situational characteristics of a team.

Desivilya and associates (Desivilya & Eizen, 2005; Desivilya & Yagil, 2005) followed this line of research concentrating on intact work teams, where members usually experience interdependence stemming from three major sources: (a) goals (definition of goals on a team basis), (b) tasks (interaction among team members, which is necessary for task performance), and (c) outcomes (interdependence in feedback and rewards). Consequently, conflicts in these types of work groups derive both from divergent interests as well as from diversity of outlooks and points of view (often diverse values or ideologies) and usually emerge in the context of decision-making processes.

That program of field research attempted to elucidate the motivational antecedents of preferences for conflict management. One study conducted on young adults' community service communes revolved around antecedents of conflictengagement versus conflict-avoidance and constructive versus destructive dispute management styles. Specifically, it investigated the contributions of individual difference variables—that is, two forms of self-efficacy, global and domain-specific social self-efficacy—and a team-related factor—namely, members' sense of group identification—to their intrateam strategic choices.

The findings indicated a positive association between global self-efficacy and dominating pattern, and indicated a negative association with the pattern of obliging. Team members who viewed themselves as highly capable of attaining their goals in a variety of areas tended to pursue them persistently to attain their expected outcomes in conflict situations. Highly efficacious (globally) team members were presumably concerned with resolving intragroup conflicts to achieve high benefits for themselves, regardless of the potential destructive effect that such actions might have on their relationships with their teammates. The result showing that commune members with high global self-efficacy were unlikely to concede in conflict situations further attests to such a self-promoting motivation evinced by individuals with high global self-efficacy.

Interestingly, overall confidence in one's capabilities to accomplish a variety of tasks fell short of predicting the other two alternative conflict engagement modes: integrating and compromising. Instead, preferences for these patterns were tied to domain-specific self-efficacy. Social self-efficacy reflects an individual's confidence in her or his capability to form and maintain social relationships, cooperate with others, and effectively manage various interpersonal conflicts. In accordance with this conception, the findings indicated that commune members with a high sense of social self-efficacy facing an intrateam dispute tended to adopt a conflict approach reflecting both engagement and constructive features—particularly, the integrating pattern—in resolving the conflict.

The results illuminate the significance of the two forms of self-efficacy in managing real-life conflicts in field settings, encountered by individuals in intact teams, where members maintain continuing and intense relationships. Generalized (global) self-efficacy clearly contributes to the active stance, but it is primarily the self-centered approach (concern for self) that determines strategic choice in intragroup conflict situations. The domain-specific, socially oriented element of self-efficacy adds an essential supplement to the active engagement proclivity—namely, the prosocial component, which facilitates the choice of genuine collaborative means of coping with internal conflicts.

As to a team characteristic reflecting members' sense of group identification, the findings showed that individuals experiencing a high identification were less inclined to employ the dominating pattern, which carries destructive implications for intrateam relationships. However, perceptions of team cohesion did not facilitate adopting constructive modes of conflict management. Group identification did not directly predict any of the cooperative modes: integrating, compromising, or obliging. The study also showed

that commune members with a high sense of social self-efficacy and strong group identification were inclined to adopt a compromising mode, considered as an engaging and moderately constructive strategy, whereas the odds of their low group-identification counterparts choosing this way of dealing with internal conflicts were slim. Thus, a team member's expectation of mutual concessions and willingness to act upon them depends not only on social self-efficacy, but also on the extent of the individual's identification with the group. By contrast, a high sense of social self-efficacy conveys both active (engaging) and prosocial (constructive) aspects to the orientation, which is most compatible with the integrating mode (being both decisive with respect to one's own needs and actively pursuing them, as well as considerate regarding the needs of others).

Another study, conducted on intact medical teams, was also aimed at identifying factors guiding the choice of strategies for dealing with intragroup disputes. It focused on the role of emotions and of the perceived nature of conflicts in team members' preferences for conflict management patterns. The study examined five categories of dispute management modes: (a) integrating, (b) compromising, (c) dominating, (d) obliging, and (e) avoiding, thus again comparing constructive versus destructive, and engaging (active) versus avoiding (passive) approaches.

In line with expectations, the results showed that conflict management patterns were linked to emotional reactions toward group members. Specifically, team members who have experienced positive emotions toward others in their work group tended to adopt the cooperative and constructive mode of conflict management (integrating and compromising). Conversely, those who have experienced adverse emotions opted for competitive and destructive patterns for handling intrateam disputes. Unexpectedly, the contentious conflict management preference was also positively related to positive emotions, although the relationship of positive emotions with a cooperative pattern was much stronger. A possible explanation for this finding may stem from the fact that the dimension of positive emotions contained a vigilance component. Thus, both types of conflict engaging-active patterns—that is, dominating and integrating—were positively related to the "positive" category of emotions comprising the vigilance component. By contrast, the passive pattern of avoiding was related to negative emotions only.

The findings also lent support to the premise that the way conflict issues are perceived determines the individual's emotional reactions. Specifically, the prevalence of interpersonal tensions (relationship conflict) markedly contributed to adverse emotional responses that, in turn, fostered preferences for contentious-destructive modes of dealing with intragroup conflicts.

The study thus points at a differentiated pattern underlying the choice of destructive in contrast with constructive modes. The findings indicated that negative emotions mediate the association of relationship conflict with the dominating pattern of conflict management, suggesting that

type of conflict has a more significant, albeit indirect, effect on the choice of destructive conflict management modes than on constructive modes. Relationship conflict seems to precipitate destructive conflict dynamics primarily by means of creating adverse emotional climate.

Prior to moving to the next section, the major insights concerning conflict management dynamics in work teams are summarized. We have presented several typologies of conflict management approaches in work teams, differing in their theoretical emphases; some (the dual concern model and the integrated version) stressing the motivational underpinnings of conflict management, some accentuating the individuals' cognitions concerning the parties' goal structure (Tjosvold, 1993, 2006), and yet another highlighting the communication tendencies. Notwithstanding conceptual nuances, these frameworks share the distinction between constructive and destructive orientations.

Subsequently, we outlined major research findings tracing the antecedents of constructive versus destructive conflict management in work teams. Diversity, notably, team composition comprising cultural mainstream subgroup versus a minority, geographical distribution, and perception of prevalent relationship conflict appear to enhance team members' tendency to employ destructive conflict management patterns. These adverse proclivities seem to be mitigated when emergent team leaders in heterogeneous work teams effectively manage intrateam communications, distributed team members are capable of spontaneous communications or team members experience a high sense of group identification. Preferences for constructive dispute handling modes are encouraged in teams where members experience positive emotions toward one another and when team members tend to view intrateam conflicts as legitimate differences of opinions (task conflicts) that need to be resolved in mutually acceptable ways. Finally, individuals characterized by high levels of social self-efficacy are also inclined to adopt constructive conflict management strategies for dealing with conflicts in work teams.

What are the outcomes of conflicts and the consequences of constructive in comparison to destructive conflict management dynamics in work teams? Under what circumstances (if any?) are conflicts in work teams functional? The next section addresses these queries.

OUTCOMES OF CONFLICTS AND CONSEQUENCE OF DISPUTE MANAGE-MENT DYNAMICS IN WORK TEAMS

In an attempt to provide a broad perspective on the outcomes and consequences of conflicts in work teams, a multifaceted approach is embraced; namely, multiple outcome variables and indicators are examined. These include group performance indicators such as goal attainment, decision quality, efficiency and innovation; team members' perceptions concerning intrateam relations; and indicators of individuals' health, well-being, and satisfaction.

Moreover, in order to meaningfully address the issue of conflicts' potential contribution to team effectiveness (the functional versus dysfunctional aspects of conflicts), we relate the myriad of outcomes to conflict types and to conflict management dynamics discussed in previous sections.

There has been a common assumption among some practitioners in the area of management and organizational behavior that conflict in organizations may be detrimental to team functioning, and hence, should be suppressed (because it impedes cooperation and productivity). Contrary to this contention, most scholars in the organizational conflict arena have argued that there are complex relationships between conflict in work teams and its consequences on team effectiveness.

Effective teamwork has been conceptualized as a process that fosters internal interactions by means of mutually helpful communication, coordination, and cooperation designed to facilitate successful completion of tasks and development of high-quality relationships among team members. Thus, conflict can be positively related to some indicators of effectiveness, such as creativity, innovation, and decision quality. At the same time, conflict can be negatively related to other indicators such as members' satisfaction, their perception with respect to relationships quality, team efficiency, and perceptions of decision quality and effectiveness.

Deutsch (2000) has asserted that the influence of intrateam conflict on the nature of internal relations and its outcome depends on the conflict management processes: destructive course may indeed adversely affect team relations and productivity, whereas constructive controversy may improve team functioning. In a similar vein, Tjosvold (2006) has argued that conflict can provide motivation for engaging intrateam discords, and that competent management of these internal conflicts, despite transient disruption, strengthens relationships among team members. This researcher showed in several studies that confidence in a team's relationships and faith in its capability to manage conflicts, both from the managers and members' perspectives, contributed to team effectiveness. Thus, engaging conflict constructively—that is, adoption of cooperative approach—constitutes a useful way to build and reinforce members' relations; this, in turn, leads to improved performance of a work team.

Other scholars (e.g., Amason, 1996; Jehn, 1997) focused on the nature of conflict, especially on the distinction between task and relationship conflict and on the impact of each kind of discord on conflict processes and outcomes. Indeed, they provided empirical evidence attesting to functional aspects of task conflict under some circumstances in some teams, such as in strategic decision-making teams, performing complex, unstructured tasks, whereas relationship conflict was generally found detrimental in work teams.

In light of the aforementioned findings, organizational conflict researchers have postulated that the key to fostering productive conflict lies in minimizing relationship conflicts while inspiring task conflict; namely, encouraging the group to tolerate disagreements without getting emotionally involved. Engaging task conflict may increase members' understanding of decisions and their commitment to these decisions and enhance perceptions of justice because their voices have been heard.

Desivilya's research (Desivilya & Yagil, 2005) has also alluded to the positive value of task conflicts, at the very least reflecting the functional aspect of this conflict type in enhancing the involvement of team members in group missions.

A recent meta-analytical study carried out by DeDreu and Weingart (2003a) has cast doubt on the functional aspects of task conflict. The findings have indicated that both types of conflicts (task and relationship) had adverse effects on team effectiveness, albeit the former were somewhat less negative than the latter, especially as reflected in team members' satisfaction.

Despite the general consensus among organizational conflict scholars regarding the dysfunctional attributes of relationship conflict, Tjosvold (e.g., Tjosvold et al., 2005; Tjosvold, 2006) has reaffirmed on the basis of series of studies his former conclusion that the type of conflicts may not necessarily be crucial in determining the outcomes of conflict; rather, the approach embraced for dealing with conflict—cooperative versus competitive—is the key determinant of discords' ramifications. Each type of conflicts may be constructively engaged.

Following that line of reasoning, Rentsch and Zelno (2003) have offered some suggestions on how to minimize the adverse effects of relationship conflict: greater congruence and accuracy among team members' cognitions can attenuate intragroup interpersonal tensions and antagonism, thereby allowing constructive engagement with intrateam discords and promoting work team effectiveness.

Beyond the intricacies of the relationships among the nature of conflict, conflict management approach, and conflict outcomes, the type of measures used to assess conflict outcomes further magnifies the complexity ascribed to conflict's functions in work teams. Several studies showed that conflict outcomes measured by means of team members' self-reports have not coincided with their objectively measured counterparts. For instance, Mohammed's and Angell's (2004) study on ad hoc teams of business students revealed that relationship conflict was negatively associated with perceived performance, but was unrelated to objective performance. Akin to these results, Tjosvold et al. (2005) found that competitive approach to intrateam conflict management had adversely affected perceptions of team effectiveness, albeit did not have negative impact on actual performance.

The picture portrayed so far about the relationships between the nature of conflicts, conflict management approaches, and processes and conflict outcomes in work teams remains rather ambiguous and inconclusive. It is unclear how much weight carries the type of conflict in comparison with the importance of conflict management dynamics on a variety of conflict outcomes. What are the precise mechanisms linking the nature of conflicts to the ways they are handled, and how do they jointly contribute to team effectiveness? In an attempt to advance understanding of this complex web of relationships, scholars have begun to develop multifaceted models. Among these efforts the work of De Dreu and Weingart (2003a) is noteworthy.

They have proposed a *contingency* perspective. The central assumption underlying these scholars' conceptual framework is that conflict influences individuals and the social systems where they function in different ways. Hence, one cannot examine solely one outcome variable such as group performance to fully grasp the phenomenon of conflict in teams. Consequently, they adopt a multifaceted approach, exploring multiple outcome variables: group performance and individual health and well-being. Furthermore, the myriad of outcomes depend on a variety of factors, such as the type of conflict, amount of conflict, the level of task uncertainty, and the approaches that the team embraces to handle conflict.

On basis of their review of the literature, they have concluded that task-related conflict requires mutual problem-solving and cooperative strategies in order to facilitate effective group performance. Additional factors may affect the relationships between task conflict, conflict management patterns, and team outcomes—notably, the level of task uncertainty. Thus, for teams engaging in tasks that entail a great deal of uncertainty and lacking a standard solution, task conflict may have benevolent effects on performance. The underlying explanation is that task uncertainty encourages careful scrutiny of the task and profound consideration of task information, which, in turn, fosters creation of novel, creative solutions.

According to the contingency perspective, the value of various conflict management approaches also depends on another defining feature of conflict; namely, whether team members experience conflict of interest (e.g. competition over scarce resources) or conflict over difference in opinions (conflict of understanding). In the former situation, a right-based approach (relying on rules and regulations while attempting to resolve the conflict) may have an advantage over collaborating. By contrast, in case of divergent opinions expressed by team members, collaborating and creative problem solving may prove a superior approach. Such a conflict management pattern would be more conducive to tracing solutions, which could be genuinely acceptable by team members.

In addition, the contingency perspective seems to suggest that different conflict management approaches may promote team-level outcomes, such as team performance in contrast with individual level outcomes such as wellbeing. Thus, engaging-active approaches (e.g., integrating or problem solving and dominating) may provide better outcomes on the individual level than nonconfrontational-passive approaches provide. Engaging conflict issues may promote well-being, enhance individual's satisfaction, and prevent frustration and burnout in the long run, regardless of the type of conflict team members have been experienc-

ing. However, confrontational approaches may not necessarily be optimal for enhancing group performance. Team level outcomes are not exclusively dependent on conflict management approach; rather, they are also affected by the type of conflict.

We have just demonstrated several possible ways of looking at the complexities of conflicts in work teams using the contingency perspective. Such multifaceted approach adopted by De Dreu and Weingart (2003b) and Jehn and Bendersky (2003) has opened numerous avenues for a thorough explication of conflict processes in the context of work groups in organizations.

We will conclude this section by presenting major findings from De Dreu's (2006) recent study, which has pursued the contingency approach in one specific direction: clarifying the equivocal findings concerning the relations between task conflict and team effectiveness.

Previous research provided some clues as to the potential factors that can modify the association between task conflict and team effectiveness. For example, intrateam trust and positive climate may mitigate the potentially negative effect of task conflict on team performance. Moreover, it has been suggested that task conflict may adversely affect certain aspects of team effectiveness while having positive impact on other aspects. Specifically, this type of conflict can hinder short-term performance indicators such as efficiency of work processes and goal attainment, because coping with complex problems due to task conflict is both time and energy consuming.

However, task conflict may foster innovation, a team effectiveness indicator based precisely on the capacity to engage in learning, developing insight, and deep understanding. Yet such complex cognitive processes are unlikely to emerge and proceed under high levels of conflict. High-intensity task conflicts may precipitate distrust and interpersonal tensions (characteristic of relationship conflict), thus eroding the cognitive advantage of this type of conflict. Consequently, only moderate levels of task conflict (not very mild or very intense) may create the appropriate conditions to promote a team's innovation. Intermediate levels of task-related disagreements may increase team members' motivation to analyze the problem, thus enhancing the odds of jointly searching and finding novel ideas and solutions that are mutually beneficial.

Indeed, De Dreu (2006) showed that moderate levels of task conflict were related to high team innovativeness in two types of work teams: performing routine tasks and performing more complex tasks. He also found that information exchange and collaborative problem solving in task conflict situations further promoted innovation in these work teams. By contrast, task conflict adversely affected the odds of goal attainment. In short, the findings manifested the differential impact of task conflict on two kinds of team effectiveness indicators—innovation (a product of learning) and goal attainment (efficiency).

De Dreu's (2006) recent research carries important theoretical implications. Both task and relationship conflict

impair overall team effectiveness, impede efficiency, and often impede goal attainment. But unlike relationship conflict, task conflict at moderate levels can promote certain elements of team's performance, for example, innovation and learning.

CONCLUSIONS

This chapter attempted to present in a nutshell a state-of-the art picture on conflict management in work teams. However, it is by no means exhaustive of the rich and dynamic research endeavors in the organizational field.

The review has corroborated the prevailing assumption that conflicts in contemporary work teams constitute a daily phenomenon, especially due to increasingly diverse workforce and globalization leading to geographical distribution of work groups. The nature of discords in organizational teams is far from monolithic; this chapter presented two major types of conflicts—relationship and task—highlighting their differential effects on conflict dynamics and outcomes.

Our review reveals a fairly complex framework underlying conflict dynamics in work teams, while the intricacies of the ties among the nature of conflict, the way they are managed, and their ramifications on team effectiveness are just beginning to unfold. Research provides some supporting evidence concerning the benevolent consequences of task conflict, especially when coupled with cooperative approach on intrateam relations and on innovation, but not necessarily on other indicators of team performance such as efficiency. Extant findings also indicate that the individual characteristics of team members, such as social self-efficacy and individual preference for teamwork, may foster adoption of constructive strategies for coping with intrateam conflict, but may also point at the important contribution of team climate factors, for example, positive emotions, group identification, trust, supportive leadership, and constructive communication in enhancing cooperative conflict management, and thereby, team effectiveness.

In sum, we understand much more about the triggers of conflicts in work teams, their nature, conflict management processes, and some of their outcomes, but a long journey is still ahead to fully elucidate the complex network of elements and their interconnections. A contingency perspective appears to be a promising approach to tackle this endeavor. Future research should also extend cross-cultural comparison studies, employ longitudinal designs and methods to trace turning points in intrateam conflict dynamics, and examine the effects of new combinations of individual characteristics and situational factors on conflict management and team effectiveness.

Finally, the chapter points at several potential applications for management of work teams. Among these, raising awareness regarding the nature of conflict and its functions in team's relations and performance, training team members and leaders in cooperative approaches to conflict management, especially in diverse and geographically distributed teams, and creating positive team climate—a sense of shared identity, group identification, and interpersonal trust—are deemed to be of the utmost importance.

REFERENCES AND FURTHER READINGS

- Alper, S., Tjosvold, D., & Law, K. S. (2000). Conflict management, efficacy, and performance in organizational teams. *Personnel Psychology*, *53*, 625–642.
- Amason, A. C. (1996). Distinguishing the effects of functional and dysfunctional conflict on strategic decision making: Resolving a paradox for top management teams. *Academy of Management Journal*, 39, 1.
- Ayoko, O. B., Härtel, C. E. J., & Callan, V. J. (2002). Resolving the puzzle of productive and destructive conflict in culturally heterogeneous workgroups: A communication-accommodation theory approach. *The International Journal of Conflict Management*, 13, 165–195.
- Blake, R. A., & Mouton, J. S. (1964). *The managerial grid*. Houston, TX: Gulf.
- Byrne, D. (1997). An overview (and underview) of research and theory within the attraction paradigm. *Journal of Social and Personal Relationship*, *14*, 417–431.
- De Dreu, C. K. W. (2006). When too little or too much hurts: Evidence for a curvilinear relationship between task conflict and innovation in teams. *Journal of Management*, 32(1), 83–107.
- De Dreu, C. K. W., & Van De Vliert, E. (1997). *Using conflict in organizations*. London: Sage.
- De Dreu, C. K. W., & Weingart, L. R. (2003a). A contingency theory of task conflict and performance in groups and organizational teams. In M. West, D. Tjosvold, & K. G. Smith (Eds.), *International handbook of organizational teamwork* and cooperative working (pp. 151–167). Chichester, UK: John Wiley.
- De Dreu, C., & Weingart, L. R. (2003b). Task versus relationship conflict, team performance, and team member satisfaction: A meta-analysis. *Journal of Applied Psychology*, 88, 741–750.
- Desivilya, S. H., & Yagil, D. (2005). Conflict management in work teams: The role of emotions in conflict management: The case of work teams. *International Journal of Conflict Management*, *16*(1), 55–69.
- Desivilya, S. H., & Eizen, D. (2005). Conflict management in work teams: The role of social self-efficacy and group identification. *International Journal of Conflict Management*, 16(2), 185–211.
- Deutsch, M. (1973). *The resolution of conflict*. New Haven, CT: Yale University Press.
- Deutsch, M. (2000). Introduction. In M. Deutsch & P. T. Coleman (Eds.) *The handbook of conflict tesolution: Theory and practice* (pp. 1–17). San Francisco: Jossey-Bass Publishers.
- Fincham, F. D. (2003). Marital conflict: Correlates, structure, and context. *Current Directions in Psychological Science*, 12, 23–27.
- Hinds, P. J., & Mortensen, M. (2005). Understanding conflict in geographically distributed teams: The moderating effects of shared identity, shared context, and spontaneous communication. *Organization Science*, *16*(3), 290–307.

- Jehn, K. (1997). Affective and cognitive conflict in work groups: Increasing performance through value-based intragroup conflict. In C. De Dreu & E. Van De Vliert (Eds.), *Using conflict in organizations* (pp. 87–101). London: Sage.
- Jehn, K., & Bendersky, C. (2003). Intragroup conflict in organizations: A contingency perspective on the conflict-outcome relationship. In R. M. Kramer & B. M. Staw (Eds.), Research in organizational behavior (Vol. 25, pp. 187–242). New York: Elsevier.
- Lau, D. C., & Murnighan, J. K. (1998). Demographic diversity and faultlines: The compositional dynamics of organizational groups. *Academy of Management Review*, 23(3), 325–340.
- Mohammed, S., & Angell, L. C. (2004). Surface-and deep-level diversity in workgroups: Examining the moderating effects of team orientation and team process on relationship conflict. *Journal of Organizational Behavior*, 25, 1015–1039.
- Polzer, J. T., Crisp, C. B., Jarvenpaa, S. L., & Kim, J. W. (2006). Extending the faultline model to geographically dispersed teams: How colocated subgroups can impair group functioning. Academy of Management Journal, 49(4), 679–692.
- Pruitt, D. G., & Rubin, J. Z. (1986). Social conflict: escalation, stalemate. New York: Random House.
- Rahim, M. A. (1983). A measure of styles of handling interpersonal conflicts. *Academy of Management Journal*, 26, 368–376.
- Rentsch, J. R., & Zelno, J. A. (2003) The role of cognition in managing conflict to maximize team effectiveness: The team member schema similarity approach. In D. Tjosvold, M. West, & K. G. Smith (Eds.), *International handbook of* organizational teamwork and cooperative working (pp. 131– 151). Chichester, UK: John Wiley.

- Rusbult, E. C. (1993). Understanding responses to dissatisfaction in close relationships: The exit-voice-loyaly-neglect model. In S. Worchel & J. A Simpson (Eds.), *Conflict between people and groups: Causes and resolution* (pp. 30–59). Chicago: Nelson-Hall.
- Simons, T., & Peterson, R. (2000). Task conflict and relationship conflict in top management teams: The pivotal role of intragroup trust. *Journal of Applied Psychology*, 85, 102–111.
- Tajfel, H., & Turner, J. (1986). The social identity theory of intergroup behavior. In S. Worchel & W. G. Austin (Eds.), The social psychology of intergroup relations (pp. 7–24). Chicago: Nelson-Hall.
- Thomas, K. W. (1976). *Conflict and conflict management*. In M. D. Dunnetee (Ed.), *The handbook of industrial and organizational psychology* (pp. 889–935). Chicago: Rand McNally.
- Tjosvold, D. (2006). Defining conflict and making choices about its management: Lighting the dark side of organizational life. *International Journal of Conflict Management*, 17(2), 87–96.
- Tjosvold, D. (1993). Learning to manage conflict: Getting people to work together productively. New York: Lexington Books.
- Tjosvold, D., Poon, M., & Zi-you, Y. (2005). Team effectiveness in China: Cooperative conflict for relationship building. *Human Relations*, 58(3), 341–366.
- Tjosvold, D., West, M, & Smith, K. G. (2003). Teamwork and cooperation: Fundamentals of organizational effectiveness. In D. Tjosvold, M. West, & K. G. Smith (Eds.), *International handbook of organizational teamwork and cooperative working* (pp. 3–43). Chichester, UK: John Wiley.

PART IX

Human Resources as a Key Strategic Factor

Human Resources Management in the 21st Century

David Lewin

University of California, Los Angeles

uman resource management consists of the attraction, selection, retention, utilization, motivation, rewarding, and disciplining of employees in organizations—in short, the management of people at work. During the last century or so, profound shifts have occurred in the industrial mix of the economy, the nature and extent of competition, and the types of work that employees perform. In particular, economic activity has shifted from agriculture to manufacturing and from manufacturing to services, with more and more employees performing relatively higher level analytical, professional, and technical work, and fewer employees performing relatively low-level, low-skill, and manual work. In the wake of these shifts, it has become common for businesses to claim that they (increasingly) compete based on intellectual or human capital rather than physical capital or "hard" assets (Pfeffer, 1994).

The phrase "human resource management," which supplanted the earlier "personnel management," conveys a sense of these shifts in that employees—people—are viewed as resources whose active management can positively contribute to organizational success. In this sense, human resources are akin to customers, financial resources, operating systems, and technology, each of which constitutes a main input into organizations, which then mix and transform these inputs for the purpose of producing major outputs—generically, goods and services and combinations thereof. The quantity and quality of such goods and services are constrained by (operate within the context of) an organization's strategic objectives. In companies, these objectives typically include rate of return on invested capital, revenue

growth, market share and, if publicly traded, share price. As with other inputs or assets, therefore, human resources must be managed strategically for the longer term and not just operationally for the short term or on a day-to-day basis.

This view of human resource management clearly indicates that those who lead and manage business (and nonbusiness) enterprises as well as component units and departments must be skilled in the management of people. At the same time and as organizations grow larger, they usually establish a formal human resources function (that is, a department) staffed by executives and professionals who specialize and assist the organization in managing its employees. An "HR department" typically develops, specifies, and monitors operating policies and practices regarding hiring, job placement, pay and fringe benefits, performance appraisal, promotion, training and development, work-life balance, and discipline and due process. However, because of the large amount of human resource/employment legislation, an HR department typically also specifies and monitors operating policies and practices regarding payroll deductions, workplace safety, equal employment opportunity, employee leave plans, employee savings and benefit plans, and employee health care and wellness plans (Jackson & Schuler, 2003).

Contemporary human resource management occurs in a world that is much different from that which existed only a relatively short time ago. A leading development in this regard is the change in employment contracting, specifically, from permanent or continuous employment to employability. During the 40-year period dating from the end

of World War II to about the mid- 1980s, the majority of employees worked continuously for the companies that employed them, were covered by pension plans, and received a stream of pension benefits once they retired from employment with those companies. Under this arrangement, employees were paid less than the value of their productivity early on and more than the value of their productivity later on, with employers gaining an economic rent during the former period and employees gaining an economic rent during the latter period. At virtually any point during this period of continuous or permanent employment, therefore, one party had an obligation to the other party. These obligations were generally not put in writing, however, which is why this arrangement is referred to as implicit employment contracting (Lewin & Mitchell, 1995, pp. 194-196). These contracts, it should be noted, applied largely to male employees who in a more traditional era were regarded as the breadwinners—the sole breadwinners—for their families.

With the onset in about 1980 and the subsequent rapid spread of global economic competition, deregulation, and technological change, the employment landscape shifted markedly. Whereas earlier on in an era of mutual and reciprocal obligations employers responded to economic recessions by laying off employees and then rehiring them when economic conditions improved, during the 1980s employers began systematically to reduce their workforces in order to achieve long-term, permanent labor cost reductions. So pervasive was this trend that even companies with the strongest reputations for continuous employment such as IBM, Kodak, 3M, Polaroid, and Xerox followed suit. Such actions sent a clear message to both current employees and new workforce entrants that continuous (and surely permanent) employment with the same company was increasingly unlikely (Osterman, 1988). During the 1990s, especially the "go-go" second half of that decade, which featured major economic expansion fueled by high-technology companies and the commercialization of the Internet, labor markets were very tight, and therefore competition for labor—human resources—was especially keen. Consequently, employee quit rates rose markedly and frequent job-changing (even job-hopping) became the order of the day. This development reinforced the message of the 1980s, namely, that continuous or permanent employment was the wave of the past rather than the present and, even more likely, the future. From an analytical perspective, employability became the order of the day, employees were paid the value of their productivity at any point in time, and implicit long-term employment contracting gave way to shorter term, often explicit, commodity type "labor" contracting, including most notably through outsourcing. These trends continued, even sharpened, into the first decade of the 21st century (Effron, Gandossy, & Goldsmith, 2003).

Another key trend of direct relevance to human resource management that occurred during the past quarter-century—indeed, during the past half-century—is the decline of private-sector unionization and collective bargaining, not only in the United States but also in most other nations.

Whereas about one third of the U.S. nonagricultural private-sector labor force once belonged to unions and worked under terms and conditions of employment that were explicitly spelled out in collective bargaining agreements that had been negotiated by company executives and union officials, today only 7.4% of private-sector employees belong to unions and less than 10% are covered by collective bargaining agreements (Greenhouse, 2007). The same fundamental forces, namely, global economic competition, deregulation, and technological change, that led to greatly reduced use of long-term implicit employment contracting also led to the decline of unionism and collective bargaining. Each of these forces served to increase both product market and labor market competition, which made it markedly more difficult for unions to negotiate economic rents for their members. Whereas unions in general and certain unions in particular were once able to negotiate wage and benefit rates well above those prevailing in labor markets more broadly, they became increasingly unable to do so when bargaining with companies in highly competitive industries rather than companies in industries characterized by oligopoly or monopoly. This, in turn, meant that union members and potential union members were unlikely to obtain a wage premium that at least offset the cost of union dues. As a result, fewer and fewer workers chose to belong to unions and more and more companies sought to avoid unions by moving operations elsewhere, including offshore, and by substituting capital and technology for (relatively more expensive) labor. Correspondingly, the incidence of company labor relations departments specializing in the negotiation and administration of collective agreements declined, and the incidence of company human resource departments specializing in the management and administration of individually oriented employment relationships increased (Budd, 2005).

Another key development regarding human resource management is the body of research that seeks to measure the effects of human resource management practices on organizational performance. Ironically, this work can be analytically linked to research that assesses the impacts of unions on wages, fringe benefits, and ultimately company financial performance. In particular, union impact research is grounded in microeconomic analysis in which collectively bargained pay and benefit rates are compared with prevailing market-based pay and benefit rates to determine the size of the resultant premiums. Within this analytical framework, labor cost increases resulting from collective bargaining have to be offset by corresponding productivity gains in order for unit labor costs to remain unchanged and for unionized firms to compete with nonunion firms in the same industry. If such offsetting productivity gains are not forthcoming, the unionized firm has clear incentives to reduce the use of unionized labor and substitute other factors of production for unionized labor. The underlying analysis in this regard is identical to the analysis of, for example, federally legislated increases in the minimum wage, municipally legislated increases in the living wage, and the like (Rees, 1977).

But whereas there is a well-developed and clearly defined analytical framework for assessing the impacts of unions and collective bargaining on company financial performance, there was until just recently no comparable framework for assessing the impacts of human resource management practices on company financial performance. This began to change in 1990, however, when Mitchell, Lewin and Lawler published an article that estimated the effects of employee participation in decision making, employee participation in variable pay plans, and certain other human resource management practices on company financial performance. Using a sample of 495 business units of publicly traded U.S.-based corporations, these authors found that the extent of employee participation in decision making, including through the use of workplace teams and quality circles, and the extent of employee participation in/coverage by profit sharing, bonus, and stock ownership plans were significantly positively associated with changes in company return on assets, return on investment, and revenue per employee. In short, this research appeared to confirm that employee financial and nonfinancial participation in the enterprise "paid off" in terms of company financial performance.

During the ensuing decade and a half, an impressive array of articles and books appeared that substantially expanded the analysis and evidence about the effects of human resource management practices on organizational performance (Wall & Wood, 2005). A leading characteristic of this work is its conceptualization of human resource management practices as bundles or packages, which were then shown empirically to have larger and more statistically significant positive effects on company financial performance than the effects of any single human resource management practice. From this research there emerged a set of "high-involvement" human resource management practices consisting of (a) employment security, (b) selective hiring, (c) workplace teams and organizational decentralization, (d) high pay contingent on organizational performance, (e) employee training and development, (f) low-status differentials, and (g) information sharing with employees. These high-involvement human resource management practices are claimed to substantially and significantly enhance organizational performance when adopted and implemented together and sustained over a relatively long period (Pfeffer & Veiga, 1999). It is this research in particular that has been invoked to support the claim that expenditures on employees can best be regarded as investments in human resources (or human assets or intellectual capital) that yield positive economic returns.

But if this is in fact so, it is not universally so; another, even more recent body of research indicates that there are also positive outcomes for organizations that emanate from what has been termed "low-involvement" human resource management practices. This research focuses on company uses of outsourcing, part-time employment, temporary employment, fixed (and typically short-term) em-

ployment contracting, and vendoring—the movement of employees of a company to one or another of its suppliers. Several studies have shown that employees in these types of work are significantly less likely to be managed by highinvolvement human resource practices than employees who work full time, work in teams, have well-defined career paths, and possess promotion as well as training and development opportunities (e.g., Lewin, 2003). Identical to research on high-involvement human resource management practices, the research on low-involvement human resource management practices attempts to measure the effects of these practices on company financial performance (Lewin, 2001b). The findings from this research are significant in a statistical sense and important in terms of practice. Specifically, the empirical evidence shows that the extent of low-involvement human resource management practices is significantly positively associated with company financial performance, measured, for example, by stock price, and with business unit financial performance, measured, for example, by return on investment. Such low-involvement human resource management practices are also significantly negatively associated with manufacturing plant labor costs and with sales and service field office payroll costs, thereby having overall positive effects on financial performance at these organizational levels. Furthermore, low-involvement human resource management practices remain significant in terms of their positive associations with organizational financial performance when account is taken of the use of high-involvement human resource management practices for other employees of these organizations (Lewin, 2003). It is this research in particular that has been invoked to support the claim that expenditures on some employees can best be regarded as containing or reducing labor costs, thereby contributing to overall organizational performance.

When these two streams of research are combined, they lead to what can best be termed a "dual theory" of human resource management and organizational performance. This theory posits that some employees performing certain types of work are best managed by investing in high-involvement practices, while other employees performing other types of work are best managed through low-involvement practices. The former set of employees can be thought of as core employees, while the latter set of employees can be thought of as peripheral employees. Both types of employees and both sets of human resource management practices can positively contribute to organizational performance. Perhaps the larger question in this regard is, "What is the appropriate or best balance of core and peripheral employees for an organization?"

Though the answer to this question is likely to differ from industry to industry and organization to organization, one overall estimate is that a combination of two-thirds core employment and one-third peripheral employment is optimal in terms of organizational financial performance. Stated differently, an organization can add value (to its financial performance) by increasing its ratio of peripheral to total employees from, say, one sixth to one fifth or from one quarter to one third, but will likely lose value (in terms of its financial performance) by increasing its ratio of peripheral to total employees from, say, one third to two fifths or to one half (Lewin, 2002); in other words, this relationship is curvilinear.

Even though research and practitioner attention has increasingly been devoted to managing human resources for competitive advantage—organizational financial performance—considerable attention has also been paid to employment dispute resolution. In this regard, the decline of unionism and collective bargaining should not be taken to me that there has been a corresponding decline in employment-related conflict in organizations. To the contrary, and as indicated by both the adoption by nonunion organizations of what have come to be known as alternative dispute resolution (ADR) systems and the substantial amount of employment/human resource management legislation that has been enacted by the federal government and state governments during the past several decades, conflict is an enduring, ever-present characteristic of employment relationships (Colvin, 2004). Hence, any informed treatment of contemporary human resource management must consider the nature of such conflict, the practices that have been undertaken in attempting to resolve such conflict, and the effectiveness of such practices.

While it is well known that the bulk of employmentrelated disputes are resolved in informal discussions between "aggrieved" employees and their immediate supervisors/managers, often using open-door and hotline policies and practices, a growing proportion of nonunion companies—perhaps more than 50%—have adopted formal employment dispute resolution systems (Colvin, 2003). These systems require that grievances (or complaints) be put in writing, and they specify a series of steps, usually three to four steps, for the processing and resolution of such grievances. Unlike grievance systems in unionized settings in which all but a handful end in binding third-party arbitration (known as rights arbitration), nonunion grievance systems vary in terms of their specified final steps. Examples of such final steps in nonunion employment dispute resolution systems include Chief Executive Officer (CEO), Chief Administrative Officer (CAO), a Senior Management Committee, peer review, and, in about 20% of the systems, binding third-party arbitration (Lewin, 2007). In addition, these systems also vary considerably in terms of speed of grievance processing, scope of employment-related issues subject to grievances, and employee eligibility to use grievance procedures. Notably, whereas in unionized settings only employees who are represented by a union—known as the bargaining unit—are eligible to file grievances, in nonunion settings the scope of employee eligibility is typically wider and may even include first-line and mid-level managers. This apparently means that more, perhaps considerably more, nonunion than unionized employees who have employment-related conflicts can invoke their respective

organizations' employment dispute resolution systems. But this also means that, unlike in unionized settings, the determination of grievance steps, speed of grievance settlement, scope of grievance issues and scope of employee eligibility to use the grievance procedure in nonunion settings is determined solely by the employer (Colvin, Klass, & Mahony, 2006). These features of nonunion ADR systems together with the fact that nonunion employers pay the costs of arbitration when this method is used has elicited considerable criticism from specialists in this area—the main criticism being that this type of system is one sided and hence unfair (Wheeler, Klass, & Mahony, 2004).

Empirical evidence shows that nonunion employees who are eligible to use organizational grievance systems do in fact do so, though their grievance filing rates are about half as large as those of unionized employees. A substantial proportion of nonunion employee grievances, between 80% and 90%, are settled at early steps of the grievance procedure, which is quite similar to what occurs among unionized employees. Only a small percentage, 2% to 3% on average, of both nonunion and unionized employee grievances are settled at the final step of the grievance procedure irrespective of what that step may be (for example, peer review or arbitration). Among male employees, whether unionized or nonunion, the issues most frequently in dispute and hence the subject of grievances are job assignment, pay rate, and discipline, including discharge from employment. Among female employees, by contrast and again whether unionized or nonunion, the issues most frequently in dispute and hence the subject of grievances are promotion, training and development, and discrimination/harassment (Lewin, 1999).

An especially important stream of research in the area of nonunion grievance systems focuses on what has been termed postdispute resolution outcomes. In particular, these outcomes include employee job performance ratings, promotion rates, work attendance rates, and turnover rates (Lewin & Peterson, 1999). The dominant analytical approach used in this research is quasi-experimental, involving comparisons of samples of nonunion employees who subsequently do and do not file grievances, respectively, under their organizations' employment dispute resolution systems; the former are referred to as grievance filers and the latter as grievance nonfilers. For these two employee groups, their job performance ratings, promotion rates, and work attendance rates are compared before, during, and after a period of grievance filing and settlement, and their turnover rates are compared after grievance settlement. The main findings from this research are that comparably matched samples of nonunion employees do not differ significantly in job performance ratings, promotion rates, and work attendance rates prior to and during grievance filing and settlement but differ markedly thereafter, with the first two of these three measures being significantly lower (and the third being insignificantly lower) for grievance filers than for nonfilers. Further, both voluntary and involuntary employee turnover rates in 1-to-3-year periods following grievance settlement are significantly higher for grievance filers than for nonfilers. Moreover, a very similar pattern of findings has been reported for samples of supervisors of grievance filers compared with samples of supervisors of nongrievance filers (Klass & DeNisi, 1989; Lewin, 1997; Olson-Buchanan, 1996, 1997).

When it comes to explaining these findings, two main alternatives have been proposed: the retaliation explanation and the revealed performance explanation. The retaliation explanation is relatively straightforward in claiming that nonunion employees who actually use their organizations' dispute resolution systems suffer retaliation for doing so—and the same is true of their supervisors. This explanation is consistent with organizational punishment/industrial discipline theory and is also supported by related survey research showing that employee fear of retaliation is significantly negatively associated with nonunion employees' use of grievance procedures (Boroff & Lewin, 1997; O'Reilly & Weitz, 1980). The revealed performance explanation is relatively less straightforward in claiming that employee grievance filing spurs or shocks company management into paying closer attention to employee performance and performance evaluation; once that occurs, management learns (ex post facto) that grievance filers and their supervisors are relatively poorer performers than nongrievance filers and their supervisors. This explanation is consistent with the shock theory of unionism—that is, unionization shocks management into improving productivity and organizational performance more broadly—and with the considerable evidence that company performance evaluation systems yield evaluation results that are in general significantly upwardly biased (Lewin, 2005; Peterson & Lewin, 2000).

In sum, the main findings from research on contemporary nonunion employment dispute resolution systems suggests that, contrary to the stated strategic, information gathering, and problem identification and diagnosis rationale underlying nonunion companies' adoption of such systems (Lipsky, Seeber, & Fincher, 2003; Feuille & Delaney, 1992), the actual use of such systems by nonunion employees leads to further deterioration of their employment relationships rather than to the resuscitation of such relationships and that the same is true for the supervisors of these grievance-filing employees. Hence, from a larger perspective, these nonunion employment dispute resolution systems are fundamentally reactive in nature and are largely incapable of ameliorating conflict and of restoring or reinstating employees—and their supervisors—such that they can be productive and contribute positively to their organizations' performance (Lewin, 2004). It is at this point, however, that human resource management research and practice can be joined with employment dispute resolution research and practice (Lewin, 2001a). Specifically, and as noted earlier, contemporary human resource management has concentrated on developing and sustaining high-involvement practices aimed at proactively engaging employees in the performance of the enterprises that employ them. Such practices typically focus on employment continuity, selective hiring, teamwork and decentralized decision making, high pay contingent on organizational performance, training and development to improve employee performance, reduction of status differentials to promote organizational egalitarianism, and business information sharing with employees. Therefore, and looking ahead, it may be asked, why can't this set of "best" human resource management practices be enhanced by adding to it proactive employment dispute identification, diagnosis and resolution, including through early-stage employee consultation in workplace and organizational decisions; targeted internal employee-as-customer research, including through electronic online surveys, to learn and gauge the depth of employees' workplace and organizational concerns; and even new and deeper initiatives at work-family life balance to address employee issues and concerns that manifest themselves as employment-related disputes but that have their origins in internal family disputes (Kaminski, 1999)? Merely posing this multifaceted question implies that human resource management in the 21st century will require deeper thought, theory development, empirical research and clinical insight than have prevailed heretofore—especially if human resources are to be used for competitive advantage by business and nonbusiness enterprises.

If new initiatives at integrating internal organizational conflict management with human resource management practices are not forthcoming or are not effective, then external regulatory approaches and methods for resolving employment relationship conflicts will continue apace and perhaps deepen. Although unlike many other developed countries the United States does not have a national employee rights law, during the second half of the 20th century much legislation was enacted to regulate one or another aspect of private sector employment relationships. The leading (U.S.) federal statutes in this regard included the 1963 Equal Pay Act, 1967 Age Discrimination in Employment Act, 1964 Civil Rights Act, 1970 Occupational Safety and Health Act, 1973 Rehabilitation Act, 1974 Employee Retirement Income Security Act, 1974 Trade Act, 1988 Worker Adjustment and Retraining Notification Act, 1990 Americans with Disabilities Act, and 1993 Family and Medical Leave Act. As explicitly indicated by some of their titles, the bulk of these laws are aimed at curbing and providing remedies for employment discrimination based on, as examples, ethnicity, gender, national origin, age, and disability. By most scholarly accounts, such laws have been effective in combating overt employment discrimination, but have been less effective in promoting workforce diversity within business enterprises (Lewin & Mitchell, 1995). This is not surprising because legislation is typically more effective in preventing than promoting certain types of organizational and human behavior. Nevertheless, during the last half-century or so, company workforces have become more diverse, especially in terms of gender and ethnicity. This development, however, has primarily been driven by company efforts to match workforce diversity with customer diversity and by the increasingly diverse labor pools from which companies recruit and select their workforces, rather than by legislation, per se (Kochan et al., 2003).

Regarding employment dispute resolution under one or another of the statutes just noted, a lawsuit that pits an individual employee or a group (known as a class) of employees against an employer commonly results. Although some of these cases have gone all the way through trial to judicial verdicts, most such cases are settled before trial and conclude with negotiated settlements between employees and the companies/employers in question. While on their face these settlements seemingly resolve the disputes that initially gave rise to them, when the issues in dispute involve workforce reductions or termination from employment the settlements only rarely result in the reestablishment of the original employment relationships or the reinstatement of employees to their jobs. Instead, the aggrieved employees receive a monetary payment in satisfaction of their discrimination claims and then move on to seek employment elsewhere (Lewin, 1999).

By contrast, some employment disputes do result in the reinstatement of employees to their jobs, notably in cases in which state courts have determined that implicit employment contracts exist. In such "wrongful termination" cases, the courts give considerable weight to such factors as an employee's length of service with a company/employer and the employee's record of job performance, promotions, and pay increases. Generally speaking, a long-term employee who has rendered good-to-excellent job performance and who has received promotions and pay increases on a more or less regular basis is most likely to be reinstated to his or her job under the judicial doctrine of wrongful termination. In reaching such a decision, a court basically concludes that the employer and employee in question had an implicit employment contract that assured continuous employment unless the employee underperformed. In response to judicial decisions favoring employees in several prominent wrongful termination cases, many employers revised their human resource policies, including those spelled out in employee handbooks, to state that they are at-will employers, meaning that the employer and/or the employee are free to end the employment relationship at any time. But as subsequent judicial decisions made clear, even an employer's explicit employment-at-will policy does not necessarily prevent the courts from reinstating terminated employees to their jobs, especially when such terminations constitute employer retaliation against employee whistleblowers (Lewin, 1994).

Even though some long-service employees and some employees who have blown the whistle on their employers' fraudulent behavior have been reinstated to their jobs as a result of state court decisions, more recent decisions of the U.S. Supreme Court in employment dispute cases, specifically in *Gilmer v. Interstate/Johnson Lane* (1991) and *Circuit City v. Adams* (2001), are especially significant and far reaching. In these cases, the court ruled that the entire range of U.S. employment laws, including Title VII of the

Civil Rights Act, the Age Discrimination in Employment Act, and the Americans with Disabilities Act, is subject to arbitration provisions contained in employment contracts between employers and employees. So strong is this deferral to arbitration doctrine that it apparently requires the "diversion of all employment litigation . . . into an employerdesigned arbitration procedure from which there is no right of appeal or only very limited possibility of court review" (Colvin, 2003). Hence, it is not surprising that this type of internal arbitration has been widely adopted by employers, especially nonunion employers, or that it has become the main alternative to litigation as an employment dispute resolution method (Lipsky, Seeber, & Fincher, 2003). It is therefore also not surprising, as noted earlier, that internal arbitration type ADR is criticized for its one-sidedness and for its failure adequately and neutrally to protect employee rights (Wheeler, Klass, & Mahony, 2004).

If the management of human resources involves a substantial element of complying with relatively new human resources and employment regulation, it also involves complying with older, longer standing regulation. A leading example in this regard is the 1938 Fair Labor Standards Act (FLSA), which contains provisions specifying minimum wage, female and child labor protection, and overtime pay eligibility and requirements. The leading example of a new challenge to this "old" law is the spate of managerial misclassification cases that have been filed during the last decade or so. In brief, these cases, which are predominantly class actions filed against retail trade employers in the supermarket and restaurant industries, involve allegations that employees holding such job titles as store manager, department manager, and location manager and who are paid annual salaries rather than hourly wages in fact perform predominantly employee rather than managerial work and, therefore, should receive or have received overtime pay for all hours worked beyond 40 in a week and, in California, beyond 8 in a day. As documented by Levine and Lewin (2006), the volume of managerial misclassification cases has increased dramatically and the potential monetary damages in some of these cases runs to the 10s and even 100s of millions of dollars.

Under the FLSA as well as state wage and hour laws, employees who do not qualify for overtime pay are referred to as "exempt" and employees who do qualify for overtime pay are referred to as "nonexempt" (meaning that they are included under—covered by—the overtime pay provisions of these laws). As originally written, the FLSA identified certain types of exempt employees, as examples, executives, professionals, and certain administrative employees. At the time the FLSA and many of the state wage and hour laws were passed, the United States was still in the midst of the Great Depression, unemployment was very high, and the majority of employees worked in manufacturing. The Congress reasoned that if employers had to pay a 50% premium for hours worked beyond 40 in a week, they would almost certainly not do so but, instead, would hire

additional employees who would be paid "regular" hourly wage rates. Not only was such expanded hiring forecasted to reduce unemployment, newly hired employees were predicted to spend all that they earned, thereby resulting in more demand for goods and services, which would help the country move out of economic recession. Neither of these predictions subsequently turned out to be supported by empirical evidence. Further, and as economic transformation ensued over subsequent decades, manufacturing employment declined, service sector employment substantially increased, and proportionately larger segments of the U.S. workforce became employed as executives, professionals, and administrators—the types of occupations and work that were exempt from overtime pay provisions of the FLSA and state wage and hour laws. Nevertheless, these laws remain in place today and the recent legal disputes that have arisen under them focus on whether employees who hold these job titles, especially managerial job titles, primarily perform predominately managerial work or employee work (Levine & Lewin, 2006).

From a human resource management perspective, the key question in this regard is "Why have managerial misclassification cases exploded?" The multifaceted answer to this question is as follows. First, and especially important to recognize, every business enterprise starts out as a small enterprise with relatively little financial capital and operates in one or a few locations with few customers and few employees. If the business survives its start-up phase—and many do not-it moves into a growth phase in which it adds financial capital, customers and employees, achieves operating profit and, most important, expands its locations. In the start-up phase, those who manage the business's few locations and facilities (and who may be members of a business founder's family) perform predominantly managerial work. To illustrate, in a retail business, managers decide when the store will open and close, the suppliers/vendors from whom goods will be purchased, the prices at which goods will be sold to customers, the type and extent of advertising and promotion, and the hiring, utilization, and disciplining of employees.

Second, as this prototypical retail business grows larger and opens more stores in widespread locations, the responsibility for deciding store operating hours, vendors, prices, advertising, and employment moves from the individual store and store manager to higher levels, for example, regions and divisions headed by regional managers and divisional managers, respectively. In other words, store operating policies and practices come to be determined and monitored on a more centralized basis, and decisionmaking responsibility consequently moves away from the store level to higher levels, including the headquarters level. Adding to this tendency are initiatives aimed at optimizing supply chain management in which decisions about which vendors to use, the terms of contracts with chosen vendors, and the scheduling of vendors' deliveries to stores are made at higher organizational levels rather than at the store level.

Third and as the business grows still larger, standard operating policies (SOPs) are put in place by top management to govern most if not all aspects of individual store functioning. Such policies closely circumscribe the behavior of store managers regarding product displays, stocking and restocking of shelves, product pricing, special attractions and discounts, work shifts, employee job assignment, inventory control, customer service, and much more. The basic concept underlying such standardization, known as replication, is that a customer will have the same experience irrespective of which store (or restaurant or other establishment) he or she enters or where the store is located. Also consistent with this policy of standardization is the concept of national, even global, branding which means, for example, that a customer of Wal-Mart or McDonald's can expect the same type of products or food to be available and to receive the same level of service regardless of location.

Fourth, in virtually all large retail businesses, individual store and location managers are compensated through a combination of base salary and bonus. Under this type of compensation plan, the bonus is typically based on the difference between a store's budgeted labor costs and its actual labor costs; the larger the excess of budgeted over actual labor costs, the larger the store manager's bonus. With this compensation plan in place, salaried store managers have a clear incentive to substitute their "labor" for the hourly paid labor of their employees. Stated differently, additional hours worked by salaried store managers cost the employer nothing whereas additional hours worked by hourly paid employees cost the employer additional hourly wages and, especially in high-demand periods, overtime pay. Therefore, a store manager who seeks to maximize his or her bonus will perform some and perhaps many nonmanagerial employee tasks and, in effect, replace hourly employees when doing so (Levine & Lewin, 2006).

In sum, the recent explosion of managerial misclassification cases can be explained by a combination of strategic, organizational, supply chain management, marketing, and compensation initiatives on the part of companies, especially retail trade companies, that, on the one hand, make good sense from a business performance perspective but, on the other hand, expose these companies to potentially large legal damages because they have failed adequately to address the changes in lower level management jobs emanating from otherwise well-meaning and well-founded strategic initiatives. Such legal exposure, in turn, raises questions about the role of the human resource management function in these retail businesses. If human resource executives of these enterprises have, so to speak, a seat at the business strategy table, then the potential consequences of the aforementioned strategic initiatives for changes in lower level store manager jobs and the overtime pay claims resulting there from could have perhaps been anticipated and dealt with exante. But if human resource executives in these enterprises do not have a seat at the business strategy table and were largely relegated to operational roles, then they are left to pick up the pieces in attempting expost to assist their enterprises in defending themselves against claims of managerial misclassification.

Once again from a human resource management perspective, this development in an increasingly important sector—the retail sector—of the U.S. economy calls into question the role and influence of the human resource function and leaders of this function in the business enterprise. Many scholars and practitioners claim that human resources—HR—is a strategic business function that should fundamentally be a business partner in the same way that finance, marketing, and operations are business partners in the enterprise (Ulrich, Losey, & Lake, 1997). Yet there are many other roles and purposes that HR functions and those who lead these functions serve in modern business enterprises, including complying with human resource/labor regulation (newer and older regulation), enforcing organizational and employment policies and practices, measuring employee performance, providing services and assistance to employees, maintaining employee personnel files, monitoring workplace safety, handling employee relocation, including abroad, and even maintaining a union-free environment. With this menu of potential duties and responsibilities, it is understandable that many HR functions in modern business enterprises are considered to be largely operational functions rather than strategic functions. But if the claim that business enterprises increasingly compete on the basis of their intellectual or human capital is at all valid, then the main challenge regarding human resource management in the 21st century is for HR functions and HR leaders to keep their eye on the prize of a strategic role in these enterprises while also performing the necessary operational role—roles—that HR functions and leaders must inevitably undertake.

REFERENCES AND FURTHER READINGS

- Boroff, K. E., & Lewin, D. (1997). Loyalty, voice, and intent to exit a union firm: A conceptual and empirical analysis. *Industrial and Labor Relations Review*, *51*(1), 50–63.
- Budd, J. W. (2005). *Labor relations: Striking a balance*. New York: McGraw-Hill/Irwin.
- Colvin, A. J. S. (2003). Institutional pressures, human resources strategies, and the rise of nonunion dispute resolution procedures. *Industrial and Labor Relations Review*, 56, 375–392.
- Colvin, A. J. S. (2004). Adoption and use of dispute resolution procedures in the non-union workplace. *Advances in Industrial and Labor Relations*, *13*, 71–97.
- Colvin, A. J. S., Klass, B., & Mahony, D. (2006). Research on alternative dispute resolution procedures. In D. Lewin (Ed.), Contemporary issues in employment relations (pp. 103–147). Champaign, IL: Labor and Employment Relations Association.
- Effron, M., Gandossy, R., & Goldsmith, M. (Eds.). (2003). *Human resources in the 21st century*. Hoboken, NJ: Wiley.
- Feuille, P., & Delaney, J. T. (1992). The individual pursuit of organizational justice: Grievance procedures in nonunion workplaces. In G. R. Ferris & K. M. Rowland (Eds.), *Research in Personnel and Human Resource Management*, 10, 187–232.

- Greenhouse, S. (2007, January 26). Sharp decline in union members in 2006. *The New York Times*, p. 11.
- Jackson, S. E., & Schuler, R. S. (2003). Managing human resources through strategic partnerships (8th ed.). Mason, OH: Thomson/South-Western.
- Kaminski, M. (1999). New forms of work organization and their impact on the grievance procedure. In A. E. Eaton & J. H. Keefe (Eds.), *Employment dispute resolution and worker* rights in the changing workplace (pp. 219–246). Champaign, IL: Industrial Relations Research Association.
- Klass, B., & DeNisi, A. (1989). Managerial reactions to employee dissent: The impact of grievance activity on performance ratings. *Academy of Management Journal*, 32(4), 705–718.
- Kochan, T. A., Bezrukova, B., Ely, R., Jackson, S., Joshi, A., Jehn, K., et al. (2003). The effects of diversity on business performance: Report of the diversity research network. *Human Resource Management*, 42(1), 3–21.
- Levine, D. I., & Lewin, D. (2006). The new "managerial misclassification" challenge to old wage and hour law; Or, who really does managerial work?" In D. Lewin (Ed.), *Contemporary issues in employment relations* (pp. 189–222). Champaign, IL: Labor and Employment Relations Association.
- Lewin, D. (1994). Explicit individual contracting in the labor market. In C. Kerr & P. D. Staudohar (Eds.), *Labor economics* and industrial relations: Markets and institutions (pp. 401– 428). Cambridge, MA: Harvard University Press.
- Lewin, D. (1997). Workplace dispute resolution. In D. Lewin, D. J. B. Mitchell, & M. A. Zaidi (Eds.), *The human resource management handbook, Part II* (pp. 197–218). Greenwich, CT: JAI Press.
- Lewin, D. (1999). Theoretical and empirical research on the grievance procedure and arbitration: A critical review. In A. E. Eaton & J. H. Keefe (Eds.), *Employment dispute resolution and worker rights in the changing workplace* (pp. 137–186). Champaign, IL: Industrial Relations Research Association.
- Lewin, D. (2001a). IR and HR perspectives on workplace conflict: What can each learn from the other? *Human Resource Management Review*, 11, 453–485.
- Lewin, D. (2001b). Low involvement work practices and business performance. In *Proceedings of the 53rd annual meeting, Industrial Relations Research Association* (pp. 275–292). Champaign, IL: Industrial Relations Research Association.
- Lewin, D. (2002, August). HRM and business performance research: Empiricism in search of theory. Paper presented at the Academy of Management 62nd Annual Meeting, Denver, CO.
- Lewin, D. (2003). Human resource management and business performance: Lessons for the 21st century. In M. Effron, R. Gandossy, & M. Goldsmith (Eds.), *Human resources in* the 21st century (pp. 91–98). Hoboken, NJ: Wiley.
- Lewin, D. (2004). Dispute resolution in non-union organizations: Key empirical findings. In S. Estreicher & D. Sherwyn (Eds.), *Alternative dispute resolution in the employment arena* (pp. 397–403). New York: Kluwer.
- Lewin, D. (2005). Unionism and employment conflict resolution: Rethinking collective voice and its consequences. *Journal of Labor Research*, 26(2), 209–239.
- Lewin, D. (in press). Resolving conflict. In N. Bacon, P. Blyton, J. Fiorito, & E. Heery (Eds.), *Handbook of industrial and employment relations*. London: Sage Publications.

- Lewin, D., & Mitchell, D. J. B. (1995). Human resource management: An economic approach (2nd ed.). Cincinnati, OH: South-Western.
- Lewin, D., & Peterson, R. B. (1999). Behavioral outcomes of grievance activity. *Industrial Relations*, *38*(4), 554–576.
- Lipsky, D. B., Seeber, R. L., & Fincher, R. D. (2003). *Emerging systems for managing workplace conflict*. San Francisco: Jossey-Bass.
- Mitchell, D. J. B., Lewin, D., & Lawler, E. E., III. (1990). Alternative pay systems, firm performance, and productivity. In A. S. Blinder (Ed.), *Paying for productivity: A look at the evidence* (pp. 15–88). Washington, DC: Brookings.
- Olson-Buchanan, J. (1996). Voicing discontent: What happens to the grievance filer after the grievance? *Journal of Applied Psychology*, 81(1), 52–63.
- Olson-Buchanan, J. (1997). To grieve or not to grieve: Factors relating to voicing discontent in an organizational simulation. *International Journal of Conflict Management*, 8(2), 132–147.
- O'Reilly, C. A., & Weitz, B. A. (1980). Managing marginal employees: The use of warnings and dismissals. *Administrative Science Quarterly*, 25(2), 467–484.

- Osterman, P. (1988). Employment futures: Reorganizations, dislocation, and public policy. New York: Oxford University Press.
- Peterson, R. B., & Lewin, D. (2000). Research on unionized grievance procedures: Management issues and recommendations. *Human Resource Management*, 38(4), 395–406.
- Pfeffer, J. (1994). The human equation: Building profits by putting people first. Boston: Harvard Business School Press.
- Pfeffer, J., & Veiga, J. F. (1999). Putting people first for organizational success. Academy of Management Executive, 13, 37–48.
- Rees, A. (1977). *The economics of trade unions* (Rev. ed.). Chicago: University of Chicago Press.
- Ulrich, D., Losey, M. R., & Lake, G. (1997). *Tomorrow's HR management*. New York: Wiley.
- Wall, T. D., & Wood, S. J. (2005). The romance of human resource management and business performance, and the case for big science. *Human Relations*, 58(4), 429–462.
- Wheeler, H. N., Klass, B. S., & Mahony, D. M. (2004). Workplace justice without unions. Kalamazoo, MI: Upjohn Institute.

Managing in the New Economy

Restructuring White-Collar Work in the United States, the United Kingdom, and Japan

JOHN HASSARD

Universities of Manchester and Cambridge

LEO McCann

University of Manchester

JONATHAN MORRIS

Cardiff University

The currently intense phase of international competition and the growing complexities and interconnections of contemporary capitalism have led to widespread assertion that the strategies, organizational forms, and employment systems of large multinational firms have had to undergo radical change. Traditional notions of the security of white-collar workers (especially middle managers) are said to have been sacrificed on the altar of competitiveness. Today's "global" corporations need, according to many arguments, to emulate Anglo-Saxon "best practice" by downsizing and delayering their managerial bureaucracies, in order to cut costs, speed up decision making, reduce bureaucratic inertia, and become more flexible and responsive to both customer demand and competitive pressures. This chapter will assess the extent of change in large firms and will discuss, in particular, the impact of organizational reforms on white-collar employees. Given the huge pressures on large firms to restructure, what is the future for middle management in the 21st century?

The chapter proceeds in three sections. First, we provide a relatively brief overview of the large amount of literature on giant firms and organizational restructuring. Second, we describe the results of our recent research into organizational forms and middle managers in large firms in the United States, the United Kingdom, and Japan (for full details, see Hassard, McCann, & Morris in press). Third, we will draw some conclusions and point to possible directions for future research on this issue. We discuss three general developments in the chapter, demonstrating (a) that organizational change has been very substantial, but that it has not resulted in the end of bureaucracy; (b) that surviving middle managers—far from being the redundant, nonvalue-adding,

and restrictive "grey suits" of popular lore—receive wider responsibilities and much heavier workloads than in earlier days; and (c) that these reforms have had similar results in all three countries, not least Japan, despite being widely described as resistant or reluctant to change.

RESTRUCTURING AND ITS RESULTS: SURVEYING THE LITERATURE

The 1990s were replete with authors, particularly in the United States, urging large firms to rethink their internal governance (see Kanter, 1989). After decades of dependence on hierarchical and bureaucratic multidivisional forms with multiple layers of management and stable career structures for managers and workers based on well-developed internal labor markets, this was a model no longer suited to more volatile market conditions due to an intensified competitive environment presaged upon fierce international competition from Japan and the newly industrialized East Asian countries (Best, 1990).

Many researchers have noted substantial organizational pressures to reform, including greater firm interdependency, the disembodiment of performance from asset ownership, business practice velocity, and power based on knowledge. More critical analysts (notably Lazonick & O'Sullivan, 2000) have noted with concern a new, short-termist emphasis on "shareholder value," necessitating a shift from New Deal–style "retain-and-reinvest" strategies toward a "downsize-and-distribute" mentality. The prescription offered by the U.S. "guru" literature, meanwhile, was to dismantle the bureaucratic-hierarchical form by downsizing and delayering; to focus on core activities; to introduce flatter, more responsive, structures; and to reengineer the business process (see Kanter, 1989).

The prime focus (or victims) of the restructuring process from bureaucratic to postbureaucratic form is often the middle manager. Certain authors are vitriolic in their criticism of this cadre (Peters, 1992). Indeed, middle managers have rarely had a good press. Historically, classic works such as those of Mills (1953) and Whyte (1960) have described middle managers with a mixture of disdain and condescending pity as rather spineless creatures, currying favor from above and safe in the knowledge of a long, if unfulfilling, career in a large and faceless corporation. Subsequently, Kanter's Men and Women of the Corporation (1977) was somewhat more sympathetic, but strongly emphasized the stagnation, lack of creativity, and entrenched privilege of the management systems of America's large firms. Jackall's fascinating Moral Mazes (1988) is fairly damning of corporations and their staff, describing ruthless, amoral, and self-serving men scrambling to climb the greasy pole. This critical trend continues in the business change literature (Kanter, 1989; Peters, 1992), although this time, it is not the corporation itself that comes in for most criticism; it is the middle layers of management, described as obstructive and "nonvalue-adding." By the mid-1990s, it was widely

argued that excessive managerial levels in organizations were leading to increased bureaucracy, reduced accountability, remote decision making, excessive monitoring, and poor communications.

In the face of the onslaught of restructuring and job loss, more sympathetic treatments of middle layers of management started to emerge (Huy, 2001), arguing that middle managers are unfairly criticized. Contrary to mainstream thinking, middle managers have much closer ties to the actual operations of the firm than top management and, therefore, should be more involved in strategic decision making, rather than attacked. Several authors have argued that the natural reaction of U.S. executives to the first signs of financial trouble—to slash staff—is actually self-defeating. The negative consequences associated with delayering and downsizing are damaging not only to employees (those laid off and those who survive), but also to the firm itself. The fallout from organizational change includes the collapse of internal labor markets and long-term careers, increased workloads and work intensification, reduced commitment among survivors (so-called "survivor syndrome"; Noer, 1998), and a reduction in loyalty (Cascio, 1998; Heckscher, 1995).

The antidownsizing literature coincided with exhortations for greater commitment from managers and employees via strengthened psychological contracts (Pfeffer, 2005) and the elevation of middle managers' jobs and roles as "change agents." Firms were therefore encouraged to perform delicate balancing acts; on the one hand, there is pressure to simultaneously cut costs and wring better performance out of white-collar staff, but on the other hand, there is an acute need to protect the best staff in the company to stop them from leaving for competitors or "burning out" under excessive workloads. Restructuring pressures therefore pull in two separate ways, and it is extremely difficult for top management to find the "right" strategy. Even when a reasonable balance between external demands and internal stakeholders is found, the competitive pressures never ease, meaning further change is always on the horizon. All of the competitors are enacting similar changes, and many firms that delivered poor financial returns or offered uncompetitive products and services before restructurings continue to do so afterward, regardless of changes to managerial structures (Baumol, Blinder, & Wolff, 2003, pp. 209-213; Froud, Johal, Leaver, & Williams, 2006, pp. 109–122).

We have established that large firms face increasingly tough times. But what have they actually done to combat these difficulties? What evidence exists of new organizational forms emerging in the United States, the United Kingdom, and Japan? The classical, multidivisional form, typified by GM and AT&T and characterized by centralized control of operations, a bureaucratic hierarchy of seven management layers, vertical integration, an internal labor market, and relative managerial job security, is said to be replaced by vertical disintegration. This entails a concentration on core activities, a more open labor market, flatter structures, and increasing managerial job insecurity in the

"postbureaucratic" organization (Heckscher & Applegate, 1994). The shifting paradigm was introduced in response to intensified international competition (ironically, from Japan; see Best, 1990) and sharpened institutional investor scrutiny. Giant firms were widely criticized by investors as bloated and inefficient. Poor returns to capital were highlighted (Lazonick & O'Sullivan, 2000) as the logic of shareholder value came to dominate top management thinking. Widespread evidence exists that firms operating under "Anglo-Saxon" corporate governance systems, chiefly those in the United States and the United Kingdom (see Dore, 2000), have introduced reform measures designed to raise efficiency, cut costs, and dump noncore activities. In many cases, these reforms have been brutal (see Froud et al., 2006, pp. 299-388, on GE), but this is not the case for all firms (see Jacoby, 2005). Some Anglo-Saxon firms continue to offer good terms and conditions to workers, including long-term employment, and have embarked on job cuts with great caution and only as a last resort (see, e.g., Pfeffer, 2005, p. 96, on Southwest Airlines; Cascio, 2006, on the budget retailer Costco).

Other authors question the extent to which large U.S. firms have actually changed. The first major study exclusively on the subject of downsizing (Baumol, Blinder, & Wolff, 2003) concluded that the majority of large firms in the United States actually *grew* in employment size over the last twenty years, despite the ubiquitous concerns about shrinkage, and that decline in employee numbers has only really been the case in manufacturing, a sector long known to be in decline since the late 1960s. Furthermore, firms' announcements of job cuts to the stock market and publicized in news media are often simply false signals designed to stimulate a quick uplift in share prices, with top management unlikely to actually implement major cuts (see Littler, 2006).¹

We also see similar signs in Japan. Although Japanese corporate governance has never been as closely connected to shareholder value logic as the Anglo-Saxon firms of recent history, Japanese firms, nevertheless, have faced tremendous difficulties with low-cost competition from the rest of Asia and declining market share and profitability. Its firms and employees, therefore, have suffered fifteen years of painful cost-cutting measures. What is more, shareholder scrutiny is starting to gather pace even here, partly due to legislative reforms and to rapidly growing North American ownership of shares traded in Tokyo (Dore, 2000, pp. 95-104; Jacoby, 2005). The Japanese case is somewhat different in that, traditionally, large Japanese firms have been vertically disintegrated, but within a context of an integrated enterprise group (Jacoby, 2005, pp. 21-26). Again, however, there is evidence of moves toward less hierarchical structures, of reduced job security, and of changes to HRM practices (Dore, 2000; Graham, 2005; Matanle, 2003; Morris, Hassard, & McCann, 2006). Accompanying these changes is a cultural shift among Japanese salarymen toward grudging acceptance of, or outright admiration for, Western executives who have enacted unpopular and tough reforms in Japan, which delivered improved results. Such a change is symbolized by the deification of the Brazilian CEO of Nissan, Carlos Ghosn, in Japanese and world media (Graham, 2005; O'Connell, 2005).

Ample evidence of vertical disintegration exists in the United States and the United Kingdom. There is also clear evidence of downsizing in certain industries, such as telecommunications and automotives (Batt, 1996; MacDuffie, 1996). This downsizing was, in part, a result of vertical disintegration and volume reductions and started in the late 1980s, but was also a consequence of changes to work design (Budros, 1997).

Delayering in the United States and the United Kingdom is less well documented, but is reported across industries by, for example, Batt (1996) in telecommunications, MacDuffie (1996) in automotives, and Heckscher (1995) and Worrall and Cooper (2001) across industries. Junior and middle managers have been particularly affected with greater workloads and spans of control. The implications of such vertical disintegration, downsizing, and delayering in the United States and the United Kingdom are an end to managerial job security, fewer promotion opportunities, more open managerial labor markets, and changing career patterns.

Japan has experienced less vertical disintegration for the reasons outlined earlier. Evidence exists, however, of reforms to the *keiretsu* system in the 1990s and 2000s, due again in part to competitive pressures and the low-growth, no-growth economic cycle in Japan that persisted between 1989 and 2003. More arms-length, fluid, commercial relationships are also emerging—for example, between enterprise group firms—partly due to the growing influence of foreign ownership in, for example, the automotive sector.

Downsizing and delayering follow the U.S. and U.K. patterns, although Japanese firms have proved far more reluctant to downsize than U.S. firms, fearing adverse publicity and experiencing less exposure to the forces of shareholder value logic than Anglo-Saxon firms. Nevertheless, Ahmadjian and Robinson (2001) and Usui and Colignon (1996) report widespread downsizing among large Japanese firms in the 1990s affecting both managers and blue-collar workers. Delayering has also been noted in Japanese organizations, with Okubayashi (1998), for example, reporting on the emergence of "softer," less hierarchical, organizational structures.

While these new organizational forms have important implications for middle managers in the three countries, potential changes arising to HRM practices in Japan are, perhaps, the most far reaching, given that practices such as lifetime employment (LTE) and seniority-based pay (SBP) have been core to large Japanese organizations (Matanle, 2003). Both LTE and SBP are under significant pressures to reform. The literature suggests that LTE is fairly robust, though offered to fewer managers and for a shorter tenure, whereas SBP is being eroded, with moves to more individualized pay (Lincoln & Nakata, 1997). Indeed Watanabe (2000) argued that SBP is being sacrificed to maintain LTE.

How do these new organizational developments impact middle managers? Certainly, the U.S. trends would point to reduced job security, less career certainty, and work intensification (Batt, 1996; Cascio, 2005; Gowing, Kraft, & Quick, 1998; Heckscher, 1995), although this is disputed (Jacoby, 1999). Similar trends are apparent in Japan (Matanle, 2003). The United Kingdom has a larger literature on this theme, but it provides mixed findings. Certain authors have argued that changes empower middle managers (Dopson & Stewart, 1990), while others point to intensified work regimes, greater insecurity, and less sanguine promotion prospects (Thomas & Dunkerley, 1999; Worrall & Cooper, 2001).

Having reviewed the extensive literature on firm restructuring and its impact on white-collar working life, we now turn to an overview of the findings from our recent study of middle managers and new organizational forms in the United States, the United Kingdom, and Japan.

MANAGING UNDER PRESSURE? AN OUTLINE OF OUR RESEARCH FINDINGS

Our research explored these change issues in depth across the United States, the United Kingdom, and Japan. In particular, we researched the nature and extent of new forms and compared their introduction across a range of organizations. Further, we studied the impact on middle managers using the voices of human resource (HR) managers and of the middle managers themselves.

We interviewed HR and general managers in a minimum of ten organizations per country plus a large number of middle managers in each of the organizations. These covered a cross section, including organizations from private and public sectors, manufacturing and services, and high-tech and standardized technology sectors. All were consciously large firms (ranging from 4,000–40,000 employees). The sample in all three countries included a cross-section of segments of the economy, including manufacturing and services and private and public sector concerns. Sectors included Automotive, Brewing, Electronics, Steel Manufacturing, Financial Services, Machine Building, Health Care, and Local Government. Where possible (which was everywhere except Electronics in the United Kingdom and Health in Japan, where access could not be arranged), the cases were sector matched across the three countries.

The first stage of our research involved interviews with senior HR and/or general managers, based on a semi-structured schedule. The schedule covered the following issues: company information, organizational change, job security, career development, and changes to work tasks. The second-stage interviews were with middle managers themselves, drawn from across the firm's functions, and, again, based on a semistructured schedule covering similar themes to the first one. Open questions were asked in both schedules. (For more details on our methodology, see Hassard et al. in press.)

The next sections of the chapter outline our findings. Broadly speaking, we uncovered four major trends that were common to all the firms.

Trend One: Organizational boundaries were shifting and shrinking as organizations concentrated on core competencies in the provision of goods and services.

This was particularly pronounced in the United States and the United Kingdom where, traditionally, large firms had been vertically integrated, but had undergone, in some cases, a process of vertical disintegration. In the United States, for example, two large, relatively old firms had divested themselves of parts divisions and outsourced any production or service not seen as a core competency. In the United Kingdom, an automotive firm, a brewer, and a steel producer had all pursued similar strategies.

The U.S. organizational boundaries had also shifted, albeit in different ways. The most radical changes were at the U.S. automotive manufacturer (AAuto), which had undergone an extensive strategy of divestment and outsourcing. This included AAuto selling off major parts divisions as independent business units and outsourcing anything not regarded as core to automotive assembly. Both contributed to downsizing. The U.S. sample electronics and telecommunications firm (AElectric) had also outsourced and/or divested to third party manufacturers. Elsewhere in the U.S. sample, a bank (AHBank), a utility (AUtility), and a (private) hospital (AHos) had all undergone widespread outsourcing of standard services. AHos, for example, had outsourced hotel and housekeeping services but had encountered quality problems and were trying to reduce their reliance on agency nurses. The U.S. local government (ALG) had contracted out certain services, such as waste collection, but this had been in the early 1990s and was limited. Elsewhere in the sample, the second U.S. bank (ALBank) had expanded rapidly while the steel producer (ASteel) was a relatively new and "lean-run" company. Interestingly, the U.S. retail firm (ARetail), again a young company, was relatively vertically integrated, keeping distribution, trucking, and warehousing in-house.

Other U.K. and U.S. organizations have increased their use of outsourcing. Banks had, for example, moved call-center and back-office work offshore. In the U.K. sample, a majority of respondents also reported shifting boundaries. Again, it was most pronounced in some of the larger, older organizations. The car producer (BAuto), steel producer (BSteel), brewer (BBrew), telecommunications firm (BTel), and utility (BUtil) had all, for example, moved from large, relatively vertically integrated manufacturers to disintegrated ones. BAuto had sold off parts manufacturing divisions and outsourced considerable parts of noncore operations, with BSteel operating a similar strategy.

Those U.K. and U.S. firms that had not increased outsourcing and so forth were, nevertheless, characterized as being relatively flat and lean. Outsourcing was not confined to the private sector. Local government authorities had outsourced services to private, third-party providers, notably in the United Kingdom. Public sector health service providers had also shifted to a quasi-market and mixed public-private provision. While flexibility and quicker decision-making processes were cited as reasons, overwhelmingly, cost-cutting measures were paramount.

The boundaries of the private Japanese firms have been somewhat different. Traditionally, Japanese firms have been vertically disintegrated, but within the context of a vertically integrated network in the form of the enterprise group (or *keiretsu*). These boundaries were largely unchanged. Certain firms were outsourcing more (to cut costs), while others were bringing outsourced work in house (in order to maintain employment levels). One large Japanese automaker had, however, dismantled its *keiretsu* and moved to a more arms-length and global form of sourcing and imposed severe cost-reduction policies.

Trend Two: Downsizing and delayering were widespread across organizations and this applied to managerial positions.

Consistent with the literature outlined earlier, downsizing employee numbers was evident in Japan, the United States, and the United Kingdom. Such downsizing, however, started much earlier in the United States and the United Kingdom than in Japan. Downsizing was found across the Japanese sample but, of course, this did not imply organizational restructuring per se. At the Japan steel producer (JSteel), for example, technological change had played an important part. Nevertheless, JSteel had restructured massively, downsizing from 25,000 in 1988 to 3,500 in 2003, including managerial jobs. JAuto, meanwhile, had the most radical recent downsize, losing 21,000 jobs since 1999 while maintaining production volume. The Japanese electronics and telecommunications firm (JElectric) similarly had reduced its workforce by 20% (12,000 jobs), but had changed its product and service focus. At the local city government (JLG), 30% of the workforce had been cut, partly by privatization. Several of the Japanese firms (JSteel, JElectric, and the industrial robotics manufacturer JRob) were downsizing their Japan-based workforce while investing overseas, principally in China.

Given a continued commitment to employment security (see below), the Japanese case study organizations employed a variety of alternatives to compulsory redundancies for managers. These included hiring freezes or dramatic hiring reductions (JElectric and JLG), early retirements (as young as 45 at JSteel and an automotive component supplier JAutoComps), and transfers of older managers to affiliates on inferior terms and conditions. Middle managers were hit heavily by this.

A more mixed pattern of downsizing was evident in the U.S. sample. AElectric and AAuto, both large and relatively old companies, had significantly downsized. AElectric's

workforce had fallen from 155,000 to 85,000 employees, with plans to drop to 65,000. This was a consequence of divestments, volume reduction, and delayering. AAuto had reduced its managerial workforce by more than half and its blue-collar employees by a third, again by a combination of volume reduction, organizational restructuring, divestment, and outsourcing. Both of the U.S. banks (AHBank and ALBank) and the utility (AUtility), despite expansion, had downsized through delayering and offshore outsourcing, with jobs lost after mergers and acquisitions. AHos and the city government (ALG) had also experienced managerial downsizing. ASteel and ARetail, meanwhile, had expanded employment levels through organic growth and acquisitions, but ran on "lean" employment principles.

U.S. downsizing methods varied, but where they differed from Japan was in the use of compulsory redundancies, sometimes in a brutal fashion. AElectric, which formally had an implicit lifetime employment guarantee for managers, had introduced a ranking system for their managers, with the lowest 10% made redundant in a so-called "rank-and-yank" scheme. Similarly, AAuto had made large numbers of compulsory redundancies, with factory closures plus a hiring freeze. Consequently, the average age of the workforce was 52 (at AUtility, it was 47).

The U.K. sample also extensively used downsizing. Unsurprisingly, given the outsourcing noted earlier, it was again marked at the older organizations. BSteel, for example, had reduced its workforce from 36,000 to 25,000 since 1999 (on top of extensive earlier reductions). This included a cut in middle manager posts from 7,200 to 4,700. BTel, meanwhile, had halved its workforce, and BBrew had reduced its workforce at its main production site from 5,000 to 300 since 1990. The three banks had all been subject to major mergers in the previous decade which had contributed to large-scale downsizing (13,000 at BLBank and 10,000 at BNBank). Compulsory redundancies were rare, particularly for managers; more typically, organizations used a combination of voluntary redundancies, voluntary early retirements, and hiring freezes. Such downsizing was typically cost driven. As the HR manager at the hospital (BHos) noted, "The merger was cost driven, to decrease management costs and increase clinical expenditure. . . . I know that two turkeys don't make an eagle, but it was a measure to get out the men in grey suits."

Managerial delayering was evident across the Japanese sample, but was most prominent at the largest organizations (JAuto, JElectric, JAutoComps, and JSteel). JSteel, for example, had reduced its middle and junior management layers from five to three, motivated by a perceived need to speed up decision making but resulting in work intensification, broader task roles, increased spans of control, and far fewer promotion opportunities. JAutoComps had reduced its layers even more dramatically, from seven to three, again at middle and junior management layers. The result was potentially speedier promotion for younger managers but with the sting of fewer posts to apply for.

Widespread delayering was also evident in the majority of U.S. sample organizations, with the most radical at the older, larger organizations. AAuto, for example, had removed 6 managerial layers, partly by merging layers but also by removing ones altogether. Moreover, this was accompanied by downsizing at each layer, leading to managerial work intensification. A second large and old U.S. organization (AElectric) had also dramatically reduced its hierarchy, moving from 14 to 7 layers, with an eventual target of 5. AHBank had also reduced 4 layers in a shift from "a hierarchical, empire, model to a lean matrix one," amid "4 years of bloodshed," according to a SVP for HR. Interestingly, in the context of the postbureaucracy debate, he added, "But we're a bank. Hierarchy is part of our DNA. We won't lose it completely; no one ever does."

In the U.K. sample, managerial delayering was also widespread. Delayering was found in both the private and public sectors, although it was more pronounced in the former in terms of the numbers of layers cut. Typically between one and three layers were cut, although a local authority (BBLG) cut four and BSteel cut seven. Respondents cited a number of reasons for cutting layers, including flexibility and communications, but cost reductions were the main reason, in public and private sector alike. The layer merger method was used frequently. BSteel, for example, introduced "broadbanding" with pay bands of up to £7,000 (before they were around £500). BAuto also merged layers.

As for job security, none of our case study Japanese firms used compulsory redundancies. Rather, they used a range of measures to downsize, all short of compulsory redundancy (Usui & Colignon, 1996), including a reduction in bonuses; reassignment and dispatch of managers, or *shukko* (JSteel and JAutoComps); loss of status (JElectric); dismissal of temporary and part-time staff (JElectric and JSteel); factory closures (JAuto and JSteel); reduction in recruitment and hiring freezes (all organizations); and voluntary early retirements (JElectric, JAuto, and JAutoComps).

In several organizations (JAuto, JElectric, and JAuto-Comps), new graduate hire freezes were accompanied by a rapid increase in midcareer hires, a fairly novel development in Japan. At certain companies, some middle managers were under considerable pressure to retire early (in JSteel's case, as young as 45). Thus, while lifetime employment was still widely practiced, it was of a shorter duration and privileged to fewer managers.

Managerial job security, or the lack of it, has also become a prominent issue in the United States. At AAuto, for example, the "internal labor market—career progression—secure jobs" managerial model had been eroded over a period of 20 years. At AElectric, for example, an implicit understanding existed that managers with 10 or more years of tenure had jobs for life, but the significant delayering and downsizing had ended this, as it had at AAuto and at AUtility. AHBank and AHR respondents reported much less managerial job security. ALG, on the other hand, re-

ported relative job security, although it had moved from an internal labor market to a more open one. Job security was reported at ARetail and ASteel, but these were relatively young and expanding companies, and there was no sense of implicit jobs for life as there had once been at AElectric, AHR, and AAuto.

The U.K. sample again followed the trends of the U.S. sample with regards to managerial job security. While the United Kingdom has, similarly, never had the institutionalized practice of lifetime employment, implicit long-term job security was the norm not only in the public sector, but also in private sector organizations such as BBrew, the sample banks, a number of the older manufacturing companies, as well as privatized companies such as BTel, BSteel, and BUtil. Indeed, in firms such as BBrew there had formerly been a sense of intergenerational job security. Such job security had long ceased for blue-collar workers in the large older organizations following the manufacturing crisis of the early 1980s. It began to become an issue, however, for managers in the 1990s and beyond. Elsewhere in the public sector, respondents reported an end to traditional jobs for life. It was in the large private sector manufacturers, banks and privatized companies, however, that it was most keenly felt, which was unsurprising, given the scale of downsizing. The director of HR at BUtil, for example, described middle managers as being caught in "a pincer-movement" and "under siege," while a respondent at the steel cable manufacturer reported "massive insecurity" and that very good managers had left because of it.

Downsizing was perhaps inevitable in the older organizations in the United States and the United Kingdom, which had divested and/or outsourced. The large U.S. electronics firm, for example, had halved its employment levels in the last ten years, while the U.S. automaker had reduced its managerial staff by half. Only two of the U.S. firms had not downsized, and these were relatively new organizations. Downsizing was also evident in the United Kingdom and Japan. In the U.K. case, the large brewer, privatized firms such as the steel producer, and the banks saw extensive reduction with downsizing; however, the utilities firm upsized. In Japan, all organizations had downsized, with major downsizing at the larger organizations.

Where the three countries differed was in their timing and methods of downsizing. Compulsory management redundancies were rare in Japan and the United Kingdom, but more prevalent in the United States. Typically, British and Japanese organizations froze hiring and used early retirements. Of the three countries, downsizing reportedly began earliest in the United States (in the early 1990s), whereas the main downsizing period in the United Kingdom was around 1996–2000 and later still in Japan (1997–2002 on average).

Delayering was extremely common in all of the countries. Although the details obviously differed widely between the firms, an estimate of the average reduction of levels of management would be from seven to four. Delayering was not as dramatic in Japan, with usually one level removed via a merger of two adjacent levels and regrading of job titles.

Trend Three: These new organizational forms had a significant impact upon human resource management policies and practices, particularly for middle managers. HR reforms entailed a breakdown of traditional career structures and individualization of pay and conditions.

Across almost all of our case studies, managerial job security was a major issue of concern. In Japan, the lifetime employment system was still largely intact, thought it applied to fewer managers. In the United Kingdom, security was still reasonably strong but widespread perceptions of insecurity existed. In the States, security was eroded in some organizations, amid widespread perception of insecurity in others. Certainly, the notion of jobs for life was almost universally described as a thing of the past.

Pay was more strongly linked to corporate and individual performance using various performance-related pay (PRP) systems. In Japan, even though seniority still played a major role, individualized elements of pay were becoming both more widespread and a more substantial percentage of the total remuneration. In the United States, where PRP is more entrenched, individual managerial performance was being much more closely aligned with pay. In the United Kingdom, pay was largely individualized.

Managerial careers were now substantially less secure, particularly in the Japanese organizations where automatic promotions for graduates on white-collar managerial tracks were once the norm. The keenest issue then felt by HR staff across the three countries was, perhaps, how to recruit, motivate, and retain managerial staff. The removal of traditional internal career ladders for white-collar staff, combined with long-hours cultures, had severe implications for staff morale.

In the U.S. sample, for example, a middle manager at AAuto responded,

In particular, my career has stalled . . . because of the way we're managing the business now. . . . There's a lot fewer jobs to go into. I think that the progression of promotions had virtually stalled. . . . It has certainly slowed down to the point where I have no reason to believe that I'll be promoted before I retire. I'm looking outside the company for a new job.

A second middle manager at AAuto noted,

It's been very good for me these last couple of years, but if we look at the whole motivation, as well as reward and recognition, it's not been easy. . . . We've gone through some really tough times the last few years. And recognition by way of compensation has been very low—recognition by way of promotional opportunities, career development, people movement has been low.

Middle managers, far from their common portrayal as pen pushers and dinosaurs, had their work and roles expanded in a number of senses. Hours of work stood at around ten to twelve per day. Broader spans of control were common, as surviving managers had to take on the work of managers who had left the company or had seen their responsibilities grow as layers merged.

Trend Four: While middle managers' experiences varied, they were acutely aware of work intensification, fearful of job insecurity, and conscious of a relative worsening of their career development opportunities.

Work intensification among middle managers in the three countries was universal, both in terms of working hours and the complexity of the tasks. On a more positive side, although the work had become more demanding and complex, these changes tended to make work more interesting and involving. There was some evidence of increased autonomy given to middle managers and some scope for innovation and, in some cases, middle management salaries and bonuses had risen significantly. Job insecurity, however, was a recurrent theme, particularly in downsized organizations in the private sector. Lack of promotion opportunities was observed in the majority of organizations. Even in expanding organizations, the problem of slow or nonexistent promotion associated with flat hierarchies was common.

The responses of managers to this new work environment varied. Some welcomed streamlined, delayered organizations and faster decision making. Others felt that working long hours was "their own choice." The vast majority worked in a state of resigned compliance, however, accepting that the general environment necessitated a worsening of their working experience. The "choice" to work long hours was actually unavoidable; although senior management was not actively forcing managers to work long hours, respondents overwhelmingly stated that longs hours are necessary in order to keep up with the sheer volume of work. Some were reluctant to take vacation entitlement because of fear of overload on return. In general, work-life imbalance was lamentable. Managers cited family conflicts, stress-related illness and absence, and exhaustion. Older managers sometimes spoke of an earlier, gentler environment, whereas younger managers had never experienced anything else.

The organizational trends outlined earlier, including delayering and downsizing, had almost inevitably trouble-some consequences for managerial careers. In the Japanese organizations, for example, promotion opportunities were diminished; the long hours/guaranteed promotion tradeoff ended due to fewer available management positions. At JSteel, for example, only 40% of junior managers were being promoted to middle levels compared to 80% formerly, and only 10% were being promoted to level 3 compared to 40% before. This was not atypical, apart from JAuto where

the numbers of managers increased. There were, however, some positive impacts of restructuring. The minimum age at which managers could be promoted to level 2 and 3 positions had fallen. At JLG, the minimum first level promotion age had fallen from late to early 30s, while at JRob managers could, hypothetically, jump grades. Such positives, however, were confined to a small number of "high flier" young managers with the majority stuck at the first tier of management.

Similar developments were also noted at the U.S. sample organizations—at least at those which had downsized and/ or delayered. It was of particular concern at the two banks (ALBank and AHBank), at the two organizations with the most pronounced delayering and downsizing (AAuto and AElectric), and at the personnel agency AHR. AAuto and AUtility, for example, had problems of an aging workforce due to hiring freezes and a "LIFO" (last-in, first-out) union agreement on redundancies. The HR director at AElectric, for example, reflecting on his own career noted, "I've been here for 27 years, and kept on getting promoted even though I didn't really try. Now it's much more difficult and we rotate managers."

The U.K. organizational sample again mirrored developments in the United States. For some of the smaller, newer, and expanding organizations, promotional opportunities were still available, although this was tempered by the fact that these organizations typically had a flat structure. Elsewhere, however, managerial career development was a thorny issue across public and private sector organizations. Indeed, it was viewed as a major, unintended, consequence of delayering and downsizing.

Job tasks have changed considerably for the middle managers. All of the Japanese respondents, for example, reported increased task environments and increased spans of control, even at the currently highly successful JAuto. Traditional supervision and management roles were added to a new expertise role and project management tasks (JAuto and JSteel). This had led to work intensification. At JElectric, for example, a 12-hour day was the norm—a 15- to 16-hour day not unusual—a feature common across the Japanese sample. All of the Japanese HR managers also accepted that the motivation of middle- and junior-level managers was problematic. JElectric's HR manager reported individualistic behavior due to performance-related pay, while JAutoComps reported a decline in peer group manager solidarity.

The U.S. sample respondents all also reported managerial work intensification with broader spans of control and a broader task environment, entailing heavy working hours. Labor-saving information and communication technologies had increased middle management workloads due to a major reduction in clerical support (ALG and AHos). Crossfunctional teamwork was also in evidence, again adding to workload (AElectric, AAuto, and AUtility). AElectric used job rotation to motivate managers, but accepted its limitations.

A different work environment for middle managers was also reported across the U.K. sample. While managers were typically contracted to work between 35 and 40 hours per week, they actually worked between 42 and 50. The HR manager of a local authority (BBLG) perhaps summed up the general trends when she noted that middle managers' roles, compared to five years ago, were "harder, broader, and more accountable." This was, perhaps, an inevitable consequence of delayering. In one of the banks, for example, branch managers had to cover up to three branches. Respondents reported increased stress for middle manages and motivational problems. An HR manager at BNBank, herself a middle manager, reported, "We're really put upon. If I could, I would leave tomorrow." At the cable manufacturer, the HR manager reported, "We've increased hours, increased the mundane work because we lost clerical staff, and as a consequence our high fliers left. We are more flexible, but we've gone beyond the advantages."

Diminished promotion prospects were also apparent to the middle managers in Japan. A manager at JSteel, for example, noted,

Once upon a time, a graduate person could move up the ten payment rates. Once upon a time, maybe 80 or 90% could get to that very high level. But nowadays, as far as I know, just 40% could get to that very high level.

In the United Kingdom, a middle manager (aged 47) at a local authority (BBLG) encapsulated this feeling: "I joined at 17 as a postboy; my mother encouraged me to do so: good pay, secure job, good prospects. I wouldn't encourage my children to do it today." The head of HR at another local authority, BVLG, reflecting on careers, agreed, "Well, put it this way: Would I want my child to go into the public services? The answer is no." He went on to reflect, "We've balanced the books, but what about the scar tissue? . . . We've gone too slim and thin."

Work intensification for middle managers was common to all the sample organizations in all three countries. Daily working hours were rarely less than 9 or 10 and regularly more. In the U.S. sample, for example, a middle manager at AAuto reported,

I've been in six assembly plants and a stamping plant and engineering staff positions. And the same message is over and over again, regardless of the organization. . . . It's that the middle ground has been left at the dock as the lean boat is being sailed away.

A second observed,

Yes, there is an incredible amount of responsibility added.... You're to do more with less.... We used to compensate the salaried people for working beyond their hours.... Now that's gone, so there is less incentive and more work. Such added responsibility did not equate to greater autonomy. As an AAuto middle manager wryly observed, "It doesn't mean I'm empowered any more; it just means I have more responsibility. Could I say no to any one of the items that are handed to me? Sure, I've tried." He went on, adding, "In this day and age of e-mail and pagers and phones and, you know, immediate questions and immediate responses, it's awfully easy for anybody to get an assignment from anybody."

Managerial work intensification was also in evidence in the Japanese sample. A middle manager at JElectric noted,

In the last several years we have seen that the scope of responsibility for each manager had dramatically increased or expanded. . . . There's no doubt that the manager's volume of work increased. Yes, to tell the truth the managers work longer hours than before, including myself. . . . Our work is increasing in complexity.

A middle manager (or $kach\bar{o}$) at JElectric reported the pressures in these terms: "A $kach\bar{o}$'s role is to encourage and motivate other workers, so, therefore, when the company president gets angry and shouts, it's always the $kach\bar{o}$. The target is always the $kach\bar{o}$."

Managers talked about the workplace as being more competitive in terms of promotions and more demanding in terms of hours and quality, with far larger roles and higher demands for quality and knowledge of wider areas—the business in its entirety. Managers at BAuto also talked of having to "work across" chimneys rather than in narrow areas of expertise, which is not only challenging but also demanding in terms of work hours. Nevertheless, managers appeared to be well motivated and committed. One could detect a strong sense of pride for working for a large firm and enjoyment of the challenge. Some spoke of close colleagues and exciting working environments, but this was tempered with widespread complaints over heavy workloads and pressure, and there were some signs that the wells of goodwill were running dry.

CONCLUSION: THE NEW TOUGHNESS OF MIDDLE MANAGEMENT LIFE IN THE 21ST CENTURY

Middle managers in all three countries faced job insecurity and experienced reduced career development opportunities. Moreover, they had been subjected to work intensification and broader tasks and roles, which had all impinged on their work-life balance. While insecurity was most strongly reported in the United Kingdom and the United States, it was still felt in Japan. Japan's traditional corporate governance and employment systems may have insulated middle managers from job cuts but not from job change. These changes have been troubling, and "company loyalty" is be-

ing questioned on both sides. The evidence of restructuring and changing job roles casts doubt on the idea of Japan as somehow reform resistant. Moreover, if one looks at the encouraging upward trends in the Japanese economy since 2004, one might argue that Japanese companies' substantial, but slow and piecemeal, response to restructuring pressures has meant a less traumatic and more successful path than some of the more radical changes attempted by many Anglo-Saxon firms.

While confirming much of the evidence in other studies, our research also raises several new questions. In order to develop a more rounded appreciation of the new working lives of middle managers, researchers might be encouraged to turn to more close-up, "internal" methods. Our research interviews represent only a snapshot of working realities; we know little about the deeper, psychological impacts of restructuring or about how managers can resist the incessant calls for greater effort and longer hours. What about resistance? Is there any scope for unions to force top management to limit workloads? More realistically, can unions or other intermediaries such as life coaches step in to ameliorate stress and anxiety in an effective way? We also know little about changes over time. Has all of this pain actually led to improved longer term firm performance? Our observations on this were downbeat, but perhaps this needs to be studied over time, possibly with the use of repeat research visits. Closer analysis of the daily life of managers might involve diary analysis, observation, or even direct participation research methods.

What we can say, however, is that our study (in keeping with many others) has uncovered some very concerning developments for midlevel managers in contemporary large organizations. As managers face up to these increased pressures and heavy workloads, it is worth remembering how much of their time and energy they sacrifice to their employers on a daily basis. Middle managers are valuable people, and many feel alienated and overloaded. Given their vastly increased levels of responsibility and accountability, perhaps it is finally time to defend the "grey-suited" managers from the bad press they have traditionally received and for employers and analysts to show them greater levels of respect and admiration. While firms (especially their HR departments) were certainly aware of these work-life difficulties, their response was usually very limited, amounting to nonbinding "work-life balance policies." While access to fair treatment guidelines, coaching, and stress counseling was useful, these represent short-term patches. Organizations are very good at giving work to people—they are not so good at taking it away. Firms might do well to consider how they could buck the trend of "doing more with less" and instead look to hire more middle managers, among whom they could share the growing workloads and rising expectations. This, of course, would require a substantial rethink of corporate cost-cutting priorities, and it is an open question as to whether employers have either the capacity or will to overturn such conventional thinking.

NOTE

1. Interestingly, Baumol et al. cite numerous studies suggesting that corporate announcements of job cuts or plant closures actually do not, in general, induce either short- or long-term improvements in share price (Baumol et al., 2003, p. 1).

REFERENCES AND FURTHER READINGS

- Ahmadjian, C. L., & Robinson, P. (2001). Safety in numbers: The deinstitutionalization of permanent employment in Japan. *Administrative Science Quarterly*, 46(4), 622–658.
- Batt, R. (1996). From bureaucracy to enterprise? The changing jobs and careers of managers in telecommunications service. In P. Osterman (Ed.), *Broken ladders: Managerial careers in the new economy* (pp. 55–80). New York: Oxford University Press.
- Baumol, W. J., Blinder, A. S., & Wolff, E. N. (2003). *Downsizing in America: Reality, causes, consequences*. New York: Russell Sage Foundation.
- Best, M. (1990). *The new competition*. Cambridge, UK: Polity.
- Budros, A. (1997). The new capitalism and organizational rationality: The adoption of downsizing programs, 1979–1994. *Social Forces*, 76(1), 229–250.
- Cascio, W. F. (1998). Learning from outcomes: Financial experiences of 311 firms that have downsized. In M. K. Gowing, J. D. Kraft, & J. C. Quick (Eds.), *The new organizational reality: Downsizing, restructuring, and revitalization*. Washington, DC: American Psychological Association.
- Cascio, W. F. (2005). Strategies for responsible restructuring. Academy of Management Executive, 19(4), 39–50.
- Cascio, W. F. (2006). Decency more than "always low prices": A comparison of Costco to Wal-Mart's Sam's Club. Academy of Management Perspectives, 20(3), 26–37.
- Dopson, S., & Stewart, R. (1990). What *is* happening to middle management? *British Journal of Management*, *1*(1), 3–16.
- Dore, R. (2000). Stock market capitalism: Welfare capitalism— Japan and Germany versus the Anglo Saxons. Oxford, UK: Oxford University Press.
- Drucker, P. (1992, September/October). The new society of organizations. *Harvard Business Review*, 70(5), 95–104.
- Fraser J. A. (2001). White-collar sweat-shop: The deterioration of work and its awards in corporate America. New York: W. W. Norton.
- Froud, J., Johal, S., Leaver, A., & Williams, K. (2006). *Finan-cialization and strategy: Narrative and numbers*. Abingdon, UK: Routledge.
- Gordon, D. M. (1996). Fat and mean: The corporate squeeze of working Americans and the myth of managerial downsizing. New York: Basic Books.
- Gowing, M. K., Kraft, J. D., & Quick, J. C. (Eds.). (1998). The new organizational reality: Downsizing, restructuring, and revitalization. Washington, DC: American Psychological Association.
- Graham, F. (2005). *A Japanese company in crisis: Ideology, strategy, and narrative*. Abingdon, UK: Routledge Curzon.
- Hassard, J., McCann, L., & Morris, J.L. (in press). *Managing in the new economy: Restructuring white-collar work in the USA, UK and Japan*. Cambridge, UK: Cambridge University Press.

- Heckscher, C. (1995). White collar blues: Management loyalties in age of corporate restructuring. New York: Basic Books.
- Heckscher, C., & Applegate, L. M. (1994). Introduction. In C. Heckscher & A. Donnelon (Eds.), *The post bureaucratic organization: New perspectives on organizational change* (pp. 1–13). London: Sage.
- Huy, Q. N. (2001, September). In praise of middle managers. *Harvard Business Review*, 79(8), 72–79.
- Jacoby, S. M. (1999). Are career jobs headed for extinction? *California Management Review*, 42(1), 123–145.
- Jacoby, S. M. (2005). The embedded corporation: Corporate governance and employment relations in Japan and the United States. Princeton, NJ: Princeton University Press.
- Jackall, R. (1988). Moral mazes: Inside the world of corporate managers. Oxford, UK: Oxford University Press.
- Kanter, R.M. (1977). *Men and women of the corporation*. New York: Basic Books.
- Kanter, R. (1989). When giants learn to dance. London: Simon and Schuster.
- Lazonick, W., & O'Sullivan, M. (2000). Maximising shareholder value: A new ideology for corporate governance? *Economy* and Society, 29(1), 13–35.
- Lincoln, J., & Nakata, Y. (1997). The transformation of the Japanese employment system: Nature, depth and origins. Work and Occupations, 24(1), 33–55.
- Littler, C. R. (2006). A signalling theory of strategy. Paper presented to Academy of Management Annual Conference, Atlanta, GA.
- Littler, C. R., & Innes, P. (2004). The paradox of managerial downsizing. *Organization Studies*, 25(7), 1159–1184.
- MacDuffie, J. P. (1996). Automotive white collar: The changing status and roles of salaried employees in the North American auto industry. In P. Osterman (Ed.), *Broken ladders: Managerial careers in the new economy* (pp. 81–125). New York: Oxford University Press.
- Matanle, P. (2003). *Japanese capitalism and modernity in a global* era: Refabricating lifetime employment relations. London: Routledge Curzon.
- Mills, C. W. (1953). White Collar: The American middle classes. Oxford, UK: Oxford University Press.
- Morris, J., Hassard, J., & McCann, L. (2006). New organizational forms, human resource management and structural convergence? A study of Japanese organizations. *Organization Studies*, 27(10), 1485–1511.
- Noer, D. (1998). Survivor sickness: What it is and what to do about it. In M.K. Gowing, J.D. Kraft, & J. Quick (Eds.), The new organizational reality: Downsizing, restructuring, and revitalization. Washington, DC: American Psychological Association Press.
- O'Connell, D. (2005, April 3). Special report: Steering Renault to better times. *Sunday Times* [London]. Retrieved September 12, 2007, from http://business.timesonline.co.uk/tol/business/article376605.ece
- Okubayashi, K. (1998). Small headquarters and the reorganization of management. In M. Harakiyo, & G. Hook (Eds.), *Japanese business management: Restructuring for low growth and globalization* (pp. 128–142). London: Routledge.
- Peters, T. (1992). *Liberation management*. New York: Macmillan. Pfeffer, J. (2005). Producing sustainable competitive advantage through the effective management of people. *Academy of Management Executive*, 19(4), 95–105.

- Thomas, R., & Dunkerley, D. (1999). Careering downwards? Middle danagers' experiences in the downsized organization. *British Journal of Management*, *10*(2), 157–170.
- Usui, C., & Colignon, R. (1996). Corporate restructuring: Converging world pattern or societally specific embeddedness? *Sociological Quarterly*, *37*(4), 551–578.
- Watanabe, S. (2000). The Japan model and the future of employment and wage systems. *International Labour Review*, 139(3), 307–333.
- Whyte, W. H. (1960). The organization man. London: Penguin.

Worrall, L., & Cooper, C. (2001). *The quality of working life: The 2000 survey of managers' experiences*. London: Institute of Management.

CROSS-REFERENCES

Excessive Work and Its Business Consequences (15) Employee Wellness Programs (60) Career Management (61) The Changing Nature of Mid- and Late Careers (63)

Work-Home Interaction

A Challenge to Human Resources Management

Eva Cifre and Marisa Salanova *Jaume I University, Spain*

Ithough historically speaking there has been a gender-based division of labor (i.e., men working in the public sphere and women in the private one—being in charge of the domestic tasks, raising children), the scenario has changed since World War II as women entered the public workforce. This trend caused the two previously separate scopes to interact and merge into one. Different theories appeared to explain the way in which this so-called *work-home interaction* (WHI) affects employees and organizations, and different strategies have developed to promote positive consequences of such an interaction.

INTRODUCTION TO WORK-HOME INTERACTION: A REALITY TO BE NOTICED

This chapter takes a general glance at this topic, focusing on the WHI strategies, especially the organizational ones, as a key aspect of the modern human resources management (HRM).

It can be said that this female incorporation into the public labor world is due to different factors:

 The feminism movement, which recognizes women's rights in equality in all life aspects

- Changes in gender education, as women are educated not only in home tasks
- The need for more than one salary to sustain a family

With it, a substantial change takes place in the present Western families, who adopt diverse forms. The most habitual form is that both members of the couple work outside the home and contribute income to sustain the family. These couples have been named in different ways: *dual-income*, *dual-earners*, *dual-career*, or *dual-job*. Their common need is to coordinate, and to make the work and family demands of both members compatible.

However, they have the added difficulty that most of these couples were not raised as sons/daughters of dual-career couples, and therefore, they do not have vicarious experiences (experience based on learning by means of observing conduct models) to solve their problems. This experience would be of enormous importance since, in agreement with the Social Cognitive Theory by Albert Bandura (1997), this vicarious experience constitutes one of the main sources of self-efficacy related to the beliefs in feeling able to suitably conciliate the demands of both the family and work scopes.

Therefore, work and family in reality are two areas of such magnitude that they have always been necessarily affected mutually; however, the recognition of the interactions among them has taken a clearer control of the incorporation of women into the world of public labor. For this reason, the spheres of work and family are no longer considered isolated lands.

Female Incorporation Into the Public Working Life: The Birth of the Dual-Earner Couples

The incorporation of women into the public working life in the last 50 years has been colossal, comprising currently of 46% of the 137 million workers in the United States, where their share of the labor force is expected to reach 48% by 2008 (National Institute for Occupational Safety and Health [NIOSH] 2007). Such data are similar in the European Union, as the female employment index reached 55.7% in EU-25 in 2004 (European Community Commission [ECC] 2006). However, the participation and treatment of both genders continue to be unequal according to hierarchic areas and levels despite legislation. In this way, women continue to have jobs that are more precarious (i.e., temporary contract, practice, or learning; part-time work), although men have less flexible schedules that are more difficult to combine with family demands. In relation to hierarchic levels, women are also less likely to reach a management job, supervise large groups, or have men as subordinates. This is the so-called *glass ceiling phenomenon*.

Despite this glass ceiling, the incorporation of women into the labor market has made the relationship between the members of the couple change. Dual-income couples are those in which both members work outside the home and contribute income for family survival. Nevertheless, other denominations used in the academic literature also exist, such as dual-earners, dual-career couples, and dual-job couples. Although they are frequently used indifferently, original differences do not exist. Thus, although dual-income couples and dual-earners include the rest, it is assumed that the dual-earners' opportunities of promotion, responsibility, and authority over the years are limited. Nevertheless, the so-called dual-career implies jobs in which there are expectations of as much job promotion (toward positions of higher hierarchic levels and greater responsibility) and economic promotion (toward higher salary). What all of the previous denominations have in common is that both members work and receive a pay in return. Therefore, they have a common problem: to coordinate and to make the labor and family demands of both members compatible.

In agreement with Francine S. Hall and Douglas T. Hall (1980), the fact that both parents work outside the home does not mean that their interests are centered on work and family in the same proportion. In this sense, the authors present four types of patterns of dual-career couples according to the implication of each member of the couple in the family or at work:

 The first pattern is that where one member displays high levels of implication with their career and low aspects related to the family, whereas the other displays the opposite pattern. This pattern is known as accommodators.

- 2. The second pattern is that in which both members are highly involved with their careers and poorly involved with family, but they highly value that family life is organized and the family is provided for. Mainly because of gender stereotypes, the most common trend is that men believe it must be women who take care of the family to a greater extent. That is, he delegates (at least temporarily) her professional development to instrumentally and emotionally maintain the family. This pattern is known as adversaries.
- 3. The third pattern is where the partners show high values in either family or work aspects, displaying opposite values in relation to the other aspect. This pattern is known as *allies*.
- 4. Finally, the fourth pattern covers those couples in which both members are highly involved with the roles carried out in both scopes, generally showing overloads when trying to take care of both roles suitably. This case is the so-called *acrobats*.

Investigation goes beyond the mere identification of patterns, indicating that the family can be a source of support or conflict depending on the type of relationship that is established between the couple. In fact, the classification (from higher to lower stress) would be as follows:

Acrobats→Adversaries→Allies→Accommodators

But what does each member depend on to be more or less involved in each role? Some factors as within-role reasons seem to be determining the degree of involvement. In other words,

- identification with the role (the greater the identification, the more time invested in that role); and
- utility of the role (the greater the utility perceived to increase the pleasure or to diminish displeasure, the more time invested).

These patterns arise because these dual-income couples evidence one fact that did not exist prior to the incorporation of women into the labor force: the work-home interaction.

Work-Home Interaction: Related Concepts and Consequences

When reading academic publications (specialized journals and book chapters) related to this topic, different terms arise. Some of them, like work-home interference or work-home conflict, offer a negative connotation. On the other hand, the term work-home balance entails a positive connotation. Finally, some neutral terms appear, as work-home interface, "common land," or work-home interaction (WHI). Coming from the statistics field, this last WHI refers to the fact that work and home are not seen as competitive scopes, in which both demands either are in conflict or are in a complex balance, but as factors that combined will provide something greater and different than would have been predicted from either one alone. Therefore, HRM should help

employees to live this WHI as a potentially positive experience, becoming the WHI into a "win-win" situation.

This WHI term also has its retractors; it can be considered somewhat restrictive as it divides employees' lives between only work and home (or more concretely, family), forgetting other important aspects of individuals' lives, such as leisure. This is the reason why some authors actually use the term work-home and not home. However, because of its popularity and tradition in the specialized literature and also to easy the reading, the term used in this chapter will be from now on always WHI, understanding "home" in a broader sense—that is, as this "nonwork" scope. On the other side, we are aware of the difficulty of separating both scopes (work and nonwork/family/home) at times because of irreversible changes in the labor context that, for example, place the employees' work beyond the established schedule, or because members carry out personal activities in working hours (e.g., personal telephone calls or e-mails).

Going through the WHI consequences, it can be said that traditionally they have been studied in a negative sense, which is studying the physical-psychosomatic, psychosocial, and behavioral consequences that the WHI might mainly have on health (or more concretely, disease).

The consequences of a negative WHI are mainly the same *physical or psychosomatic consequences* that any kind of stress may have, that is, stomachache, headache and backache, annoyances, fatigue, dizziness, and pain in the chest or heart areas. In the long term, longitudinal studies have proven that the negative impact of work toward home (W/H) scope happens during a shorter time period (e.g., with dream deprivation), whereas the conflict from the home toward work (H/W) domain produces more damage to health in the long term.

With regard to *psychosocial consequences*, it has been explored how specific work domain factors affect the marital quality or satisfaction and how some home domain factors might influence work aspects such as work commitment, job satisfaction, or work stress. However, the predominant subject of study has been stress derived from making work and home demands compatible. As previously mentioned, we can therefore state that stress reactions will mainly appear in the couples with the so-called *acrobats* relationship.

Chaya S. Piotrkowski (1979) explained this stress as the combination of both role demands by a contagion of the stressing experiences between the roles. This contagion could take place in two fundamental ways:

- Stress spillover: The stressing experiences suffered by an individual in one of the domains would spread to the other domain of the same individual (e.g., a person is upset with his or her family after an exhausting day at work).
- Stress crossover: The stressing experiences faced by the
 partner in an area are transformed into stress for the individual in the other area (i.e., the dismissal of a partner
 affects the mood of the whole family's members).

There is evidence that both types of contagion exist. Given the predominant role conferred to work, more studies have examined how work affects the home domain than vice versa. However, the role of the home domain as a determinant of some organizational results (such as organizational commitment) is beginning to be recognized, and is especially interesting for HRM.

Finally, the *behavioral consequences* of the WHI have been studied in both directions, at individual and organizational levels. Thus, individual-level results show that the consumption of stimulating substances increases (mainly, alcohol in the interference of the work demands over the home domain). The abuse of medication and lack of regular exercise also appear in the interference of the home over the work domain demands.

At an organizational level, we can say that longitudinal evidence of the influence of the WHI on abandonment, absenteeism, and reduced performance is limited. Some explanations for this lack of relation can be located in the existence of modulator variables, such as the degree of connection between work and home domains. More research in this sense is needed. Nevertheless, although direct consequences in the organization remain unclear, it is obvious that indirect consequences (e.g., through the psychosocial consequences such as stress and burnout), which the organization should control, will exist.

As previously stated, only the negative consequences of the WHI have generally been studied. Nevertheless, and according to the new movement in psychology denominated "Positive Psychology," it would be interesting to also study the positive effects of such interaction by promoting psychosocial health at work. Research is advancing in this sense, including this positive interaction as an indicator on health and quality of life indices.

HUMAN RESOURCES MANAGEMENT AND WORK-HOME INTERACTION: A GLANCE AT THE SUPPORTING THEORETICAL BACKGROUND

WHI theories might be grouped from different points of view:

- Theoretical-conceptual, attempting to explain the processes of mutual influence between both spheres
- Analyses of the factors that make this interaction a positive or negative experience for the employee

Theoretical Perspective of the WHI

Based on Sabine A. E. Geurts and Evangelia Demerouti's (2003) classification of the theoretical background that has covered the WHI, theories might be grouped into

 classic theories, which include segmentation, compensation, and spillover hypotheses;

- role hypothesis, where both role strain and role enhancement/accumulation hypothesis are grouped; and
- · recent perspectives.

Classic Theories of the WHI

The relationship between the work and home domains has classically been the basis of three different hypotheses. It is important to indicate at this point that although the classic theories have been based on this interaction in terms of the use of abilities and patterns of behavior, nowadays this interaction has been extended to other aspects such as emotions.

These three main hypotheses are as follows:

- 1. Segregation hypothesis: It is the earliest, as in 1956, Robert Dubin postulated that the WHI does not exist. Both domains are considered psychologically, physically, temporarily, and functionally separate. Therefore, it is assumed that the activities make unique demands on individuals. This point of view has been applied more to blue-collar workers, with generally more unsatisfactory and less involved works than it did to white-collar workers. Nevertheless, there has not been sufficient empirical support, since segregation does not happen naturally: it only exists as an active attempt of the workers to avoid work activities interacting with their family life. Furthermore, it has been shown that men can use this as a strategy to consciously face WHI. In addition to this hypothesis, in 1960, Harold Wilensky distinguished the next two hypotheses as two main hypotheses on the W/NWI.
- 2. *Compensation hypothesis*: Home compensates the deprivations experienced at work.
- 3. *Generalization hypothesis*: The experiences lived in an area can affect the other through the spillover or generalization processes.

As appraised, both hypotheses are based on a negative point of view of the work domain, where negative experiences at work are compensated with or generalized to the home domain. The two competing hypotheses have obtained some evidence and it can be said that even they can even operate simultaneously.

Additionally, these simple theories can become more complex in the light of recent results. In this sense, the Effort-Recovery Model is starting to be used to explain the negative effects of overload at work on home well-being through a generalization process of the overload negative effects that prevents the employee from recovering outside work.

Role Hypothesis

The following hypotheses are role-related: *role strain hypothesis* and *role enhancement hypothesis*.

The main starting point of the *role strain hypothesis* is the assumption that managing both roles inevitably produces "strain." The specific role strain that has developed

more interest by researchers in this field has been the role conflict, or specifically the work-family conflict (WFC). According to Jeffrey H. Greenhaus and Nicholas J. Beutell (1985), WFC acknowledges that forces deriving from the work and home domains can be incompatible and has been defined as a type of interrole conflict in which such forces are somewhat incompatible.

It is important to distinguish the direction in this conflict (work→family or family→work) as well as the sources of conflict. In relation to its direction, some more relevant stressors might affect the WFC are work-role stressors (work overload, work conflict, etc.), task and work schedule characteristics, frequent trips, changes of residence to accommodate work, work engagement, and career relevance. Conversely, the family stressors that might affect the WFC can be divided into specific (related to normative or occasional events) and chronic stressors. According to the conflict sources, we can talk about time-based conflict (time used in an area makes difficult the participation in the other area), strain-based conflict (the tension symptoms/joy experienced in a role interferes and make difficult the participation in the other role), and behavior-based conflict (the required specific conducts in a role are incompatible with the behavior expectations in the other role).

As appraised, the perspective of role strain is implicitly based on Stephen R. Marks' (1977) *shortage perspective* of the fulfillment of multiple roles and human energy. The basic assumption is that the time and power resources available are limited, and that there is every likelihood that the fulfillment of multiple roles leads to a reduction of these limited resources. With the objective to prevent work-home role strain, the individuals must concentrate their limited resources in the multiple roles of both domains in such a way that any role strain developed is formed only in bearable proportions.

Unlike the role strain hypothesis, the *role enhancement hypothesis* suggests that the energy or abilities mobilized or developed in one domain can also improve the way the person performs in the other domain. The authors refer to this process as *positive generalization*, *role enhancement*, or *role facilitation*.

This hypothesis is based on the enhancement approach by Stephen R. Marks (1977), according to which the development of multiple roles does not have to be necessarily associated with the exhaustion of resources or energy. Based on human physiology, Marks affirmed that the process of consumption of human energy inseparability is related to the production process of this energy. Activity is necessary for energy production, and even while energy is being used, it is being converted for subsequent use. In other words, the suitable management of multiple roles can also create energy.

Focusing then on a positive point of view of the WHI, this hypothesis heightens the possibility of active generalization, postulating that it is possible to generalize the abilities developed in one domain (e.g., decision making at work) to the other (e.g., decision making in the family).

Although empirical results seem to support a model of enhancement more than one based on shortage does, recent investigation suggests that both processes are difficult to distinguish (both conceptually and empirically), and that they can operate simultaneously and can even depend on individual differences (e.g., personal dispositions, gender), family circumstances (e.g., parental), and work characteristics (i.e., very stressful jobs).

Recent Perspectives

Although role hypotheses continue to dominate the WHI research, recent tendencies have gone further by taking a more positive point of view in which both domains can be harmonious. Despite that these tendencies come from more general theories of job stress, in this chapter, we present the most important theories adapted to the WHI research.

- 1. The Conservation of Resources Theory (COR). The COR model (Hobfoll, 1989) proposes that individuals look for the acquisition and maintenance of resources. Stress reactions take place when they feel resources might be lost, when resources are lost, or when they are permitted to gain expected resources. The COR theory proposes that the WHI can become the WFC because valuable resources are lost in the process of attempting to combine both the work and family roles. The difference with the role strain model is that the performance of multiple roles is not inevitably related to greater levels of stress, since performing each role can also offer resources that may help individuals to deal with the other demands associated with the fulfillment of the other roles.
- 2. The Fit Model. The fit model (Barnett, Gareis, & Brennan, 1999) goes beyond the individual level, postulating that the family fit strategies mediate between working hours and burnout. In this way, the fit concept does not assume an inherent conflict between home and work; rather, it assumes the existence of adaptive strategies formulated to maximize the abilities of the employees to cover the necessities in relation to both work and the social system. Thus, fit focuses on the adaptive strategies that the couples set up to optimize and maximize the adaptive family strategy. Then, when options at work enable workers to realize their strategies, workers experience compatibility; when they do not, workers experience conflict.
- 3. Work/Family Border Theory. According to the work/family border theory (Clark, 2000), work and family are two different domains characterized by different cultures (aims, language, rules, clients, and behavior). People cross the border between family and work every day. Therefore, they fit their language, rules, and so forth in order to satisfy the demands of each domain. This transition will be less extreme for some people than it will for others. This theory explains how individuals manage with the borders between family and work to obtain balance.
- 4. *The Ecological Systems Theory*. This theory (Grzywacz & Marks, 2000) assumes that the WHI is a joint function of the person, context, and time characteristics. Each of these characteristics exerts an additive (and potentially inter-

active) effect on the individual experience of the WHI, which is reflected in the fit between the person and his/her environment. A wider conceptualization of the WHI is used, distinguishing between the positive and negative spillover between work and family, and vice versa. They hypothesize that the job resources (e.g., job control and social support) and family resources (e.g., the partner's support) would be associated with lower levels of negative spillover and higher levels of positive spillover between both domains. On the other hand, the ecological barriers of work (such as time pressure) and home (such as discord in the couple) would be associated with higher levels of negative spillover and lower levels of positive spillover between the two domains.

- 5. Congruence Model. This theory (Edwards & Rothbard, 2000) postulates the spillover between both domains owing to a third variable—that is, personality, different behavioral styles, social and cultural forces. For example, some women assume a passive role both in the family and at work because of the cultural socialization of the female role.
- 6. *Demand Resource Model*. The demand-resources model (Demerouti, Bakker, Nachreiner, & Schaufeli, 2001) proposes four main hypotheses:
 - 1. When work demands require too much effort and time (i.e., work overload, short deadlines), work resources are not enough (i.e., low social support, lack of autonomy) and energy and time resources are over. Consequently, negative load effects appear and damage the performance in the home domain, in which case it can be said that work negatively influences the home domain.
 - 2. When work resources are sufficient to manage the work demands, individuals will feel encouraged to learn and "to grow" in their work, and this energy will be mobilized. This will facilitate the performance in the home domain in which case it can be said that work positively influences the home domain.

These two processes can also be initiated in the home domain:

- 3. When *home demands* require too much effort and time (i.e., tasks to take care of at home, children and elderly people) and *home resources* are not enough (i.e., the couple's lack of instrumental support), energy and time resources are over. Consequently, negative load effects appear and damage the performance in the work domain in which case, the *home domain negatively influences the work domain*.
- 4. Finally, the existence of *sufficient home resources* (e.g., domestic help, baby-sitter, partner's support) to manage the demands will be associated with a positive load effect that will facilitate the performance in the work domain. Then, *the home domain positively influences the work domain.* This is obviously the result that companies will look for using different strategies that we will look at further on in this chapter.

Variables Related With Work-Home Interaction

Although empirical results show that whereas the consequences of work—home are negative, those of the home—
work are positive, a series of studies focused on analyzing
the intervening variables grouped into two large clusters:
sociodemographic variables and other related variables.

In relation to the *sociodemographic variables*, only the gender and family structure interaction appears to be significant. Concretely, a negative relationship is shown between both domains in women with small children. With regard to the rest of sociodemographic variables and their relationship with the WHI (age, level of education, income and career), the results are mainly inconsistent or nonsignificant.

The rest of the variables studied in relation to WHI (see Geurts & Demerouti, 2003 for a wider explanation) are as follows:

- Personality characteristics: Neuroticism, Type A behavior (in particular, the irritability and impatience components), and negative affectivity have been positively associated with the WFC, whereas extraversion and internal locus of control are negatively associated.
- Home demanding aspects: These aspects (in particular, parental load, family criticism, and discord in the couple) are also related to the negative influence of the home domain on the work domain.
- Family and work characteristics: Results show that demanding work aspects are responsible for the negative influence of work on the home domain. On the other hand, motivational aspects of the job (resources, in agreement with the theoretical model of demand-resources, seen previously; e.g., job control and social support) and of the home (overall, the partner's support) diminish the negative interaction, and they even evoke a positive one.
- Personal attitudes: Results show that a high implication
 in a domain (e.g., home) is associated with a high conflict
 originated in that domain (e.g., conflict from the home
 toward work) owing to the (excessive) investment of time
 and effort in this central domain.

Nevertheless, research works have been mainly based on self-report and cross-sectional research, which do not allow evaluating the causality. Therefore, the development of longitudinal studies with more objective measures is necessary, as they will help explain which variables influence what.

WORK-HOME INTERACTION STRATEGIES FROM HUMAN RESOURCES MANAGEMENT

Strategies to avoid the negative consequences of a badly managed work-home interaction (WHI) and to promote a positive outcome can be developed by the employee at an individual level (employee strategies) or can be provided from the company (organizational strategies).

Employee Strategies

Different traditional classifications exist of the personal strategies to cope with the WHI positively in *dual-income* couples. Some of them are general coping strategies that might be adapted to the WHI. One of the most famous typologies of these strategies is that proposed by Douglas T. Hall in 1972. According to this author, individual coping strategies might be grouped into the following types:

- Type I (structural role redefinition): This category implies an active attempt to influence emitters on the role to diminish the conflict by reaching a mutual agreement about a new role set of expectations—that is, eliminating or negotiating a reduction of real activities.
- Type II (personal role redefinition): In this case, the individual changes his or her own attitudes toward his or her role to reduce the potential conflict altering one's own standards of role performance.
- Type III (reactive role behavior): It consists of trying to fulfill the expectations of the others in relation to our role (e.g., working harder to fulfill the expectations of the other both at work and in the home context) by adjusting demands to the role by more efficient time management.

A second classification of coping behavior is that proposed by Ellen S. Amatea and Margaret L. Fong-Beyette (1987) from two bipolar dimensions: problem- versus emotion-focused coping strategies and active- versus passive-coping strategies. Problem-focused coping involves cognitive and behavioral efforts aimed to change the source of stress, while emotion-focused coping is directed toward a person's own emotional reaction to the stressor. The active type attempts to deal with stressors and involves doing or thinking something to manage the problem, whereas the passive type attempts to use avoidance behaviors to ignore or put off having to deal with the problem. By using a combination of both dimensions, the authors distinguish four types of coping:

- 1. *Active emotion-focused:* Trying to see the positive side of the situation or drawing on past experience, speaking with friends, and doing physical exercise.
- 2. *Active problem-focused*: Attempting to resolve the problem through overt behavioral actions by prioritizing activities, looking for external help, or negotiating with others.
- Passive emotion-focused: Reducing tension through the denial of the seriousness of the situation, suppression of negative feelings, and displacement of negative feelings onto someone or something else.
- 4. Passive problem-focused (defense mechanism): Attempting to avoid the problem by thinking about something else and pretending the problem does not exist. It includes strategies like working harder to fulfill others' expectations or eliminating some roles.

Focusing on *dual-income* couples, Gloria W. Bird and colleagues (G. W. Bird, G. A. Bird, & Scrugs, 1983) identified five specific coping mechanisms:

- *Planning* (labeled *organization* by previous researchers) involves structuring work and/or home activities by organizing, prioritizing, and working more efficiently.
- Seeking support through talking to others (previously labeled social support) refers to communicating with others who can empathize with one's situation and provide a support system to relieve stresses.
- Withdrawing (previously labeled avoiding responsibilities) is defined as temporarily avoiding stressful situations and responsibilities to reduce tension.
- Cognitive restructuring refers to an individual's attempts to redefine stressful, negative situations as positive or neutral experiences.
- Limiting job responsibilities (previously labeled subordinating career) is defined as restricting participation in occupational activities.

Generally speaking, coping active mechanisms are most effective—in particular, those whose intention is to change one's own attitudes about which demands can be surpassed in realistic ways in both domains.

In relation to these active strategies, Boris B. Baltes and Heather A. Heydens-Gahir (2003) recently wrote of other behavioral personal coping strategies whose objective is to diminish the home-work and work-home negative interaction by means of reducing both scope stressors. Based on the Life Management Theory, three main coping behaviors (selection, optimization, and compensation) would exist. Selection behaviors allow a person to choose the goals that are to direct the rest of behavior (because of preference or loss of resources). Once the goal is chosen, the excellent means are chosen, and they are then optimized in order to accomplish the goals. These optimization behaviors include persistence, practice, learning of new abilities, learning from others successfully, and organization of time and energy. When optimization behaviors are not sufficient to achieve goals and when previously available means are no longer accessible or are blocked, compensation behaviors begin. They are excellent, especially in overload situations that frequently happen in dual-career couples.

Organizational Strategies

The organization can develop strategies to avoiding the negative organizational consequences and to promote the positive ones of the WHI. In this sense, organizational policies and culture—such as work schedules, family-friendly policies, and supervisor support—have been described as one of the main antecedents to avoid the negative consequences of the WHI. The interest in these organizational strategies is such that the *International Journal of Human Resource Management*, one of the most prestigious journals

in this area, dedicated a special issue to work-life balance in March 2007.

In practice, we also note that the interest in organizational strategies is increasing in recent years. Increasingly more managers invested in *Employee Assistance Programs* (EAP) in relation to the family, as they expect that these programs result in a series of positive results for the organization (e.g., improved recruitment, reduced abandonment, increased moral of employees, increased work commitment, and better performance and productivity). Based on the previously described demand-resources model, it can be said that this WHI will end in positive consequences through organizational strategies that suggest

- a decrease of demands, mainly working demands (e.g., through part-time work or not pressing to work overtime);
- an increase of resources, both working resources (e.g., greater autonomy to manage working schedule) and home resources (e.g., providing a kindergarten service in the company) to cope with both kinds of demands.

Organizational strategies to promote the positive WHI (attaining balance in life, i.e., empowering harmony and encouraging personal growth, as stated by McCubbin and colleagues [1980]) have been labelled in different ways, such as "friendly policies" or "work-home balance policies," and can be grouped into three blocks:

- 1. Strategies focusing on the implantation of flexible systems
- 2. Strategies focusing on offering benefits for child and senior citizen care
- 3. Other policies of work-home balance

Organizational strategies based on flexible systems are, as Suzan Lewis (2003) has indicated, those that allow the employee to vary—in some degree—when or where to work, or to diverge at least from the traditional schedule. These measures offer the employee a greater control of his or her work schedule, offering the important resource of time to manage the nonwork demands (i.e., going to the bank, taking care of children) and thus reducing absentee-ism. Three main strategies are based on flexible systems:

- 1. Time flexibility, both in the working schedule as in the calendar (i.e., flexible starting and leaving times, temporal work, shared work, part-time work, reduced working day, annual hours, shift work)
- 2. Working place flexibility (as telework)
- 3. Leaves or permissions (flexibility in choosing holidays, leaving the workplace because of a family emergency, increase of maternity/paternity leave, additional nonpaid holidays, professional breaks, sabbatical periods, etc.)

These flexible systems in companies are starting to be appreciated, such as a strategic business needs to establish priorities such as cost cuts, working performance, job satisfaction, increased motivation, lowering of stress due to overload, less absenteeism, and increased career development opportunities.

Organizational strategies focused on offering benefits for the care of the people who depend on employees, such as children and elderly people, provide information/subsidy services related to these people. Some of these benefits include providing information and references to employees on external agencies in charge of child care and caring for the elderly; paying a kindergarten or babysitter service during business trips; reserving places in local schools; and financing or providing economic support for child care, care for the elderly through an external agency, and other domestic services (parking, restaurants, sport centers, etc.). These strategies have proved to be particularly interesting for women in *dual-income* couples, as they partially relieve them from the so-called "double shift" (working hard at work and at home).

Finally, other policies of the WHI gather different measures taken by the companies, such as (a) job adaptation (temporarily changing the work load or responsibilities), (b) advising policies focused on the professional scope (psychological, legal, financial advice) and training focused on the WHI (time-stress-conflict management) or even in the home scope (i.e., prenatal education, nutrition courses), and (c) social or extra-legal benefits, which cover aspects such as life or medical insurance, retirement planning, and leisure activities in the company.

Besides this typology of organizational strategies, research has shown the importance of a new aspect to be considered when implementing these strategies: the way in which they are implemented. In this case, we can distinguish between compulsory organizational strategies (by legislation) or voluntary ones. As we will see later, it is important for employees to distinguish between the two.

As Suzan Lewis (2003) has pointed out, the objectives that follow the legislations of the different countries are as follows:

- On one hand, to force all companies to implement certain measures with the purpose of protecting the workers' minimum rights to cope with the conciliation of their home and working lives
- 2. On the other hand, to help create a normative climate of support that will allow the companies to voluntarily propose conciliation strategies for home and working life

In addition to the compulsory measures adopted by the organizations, companies can actively adopt a series of measures. But what does a company depend on to decide to voluntarily adopt one or several measures of the work-home conciliation? This decision cannot be explained from a

single variable, but possibly from the interaction of several variables such as the following:

- The size of the organization (bigger companies have more opportunities to implement extra measures)
- The company's sector (the more companies that adopt voluntary measures in the sector, the more likely a particular company is to adopt them; besides, public companies will implement voluntary strategies more easily than private ones)
- The number of women in the organization (the higher the number, the more likely the company adopts voluntary the work-home conciliation measures)
- The perception from which they derive positive results (e.g., organizational commitment)
- *Technical factors* (like retaining qualified personnel in sectors where more candidates are looked for)
- The *human resources policies* of the company (which consider the work-home balance as a value to be promoted among employees)

Although very few studies exist that focus on the *success* of these voluntary measures, empirical results stress their positive organizational and individual results, such as improvement in more effective management of work and personal stress, increased performance, increased work attendance, improvement of the employees' relationships with workmates, and increased loyalty of supervisors and employees.

Nevertheless, and perhaps against what was intuitively expected, the success of the measures of WHI depends not only on the strategies that the company has formally established, but also on the existence of a support organizational culture to WHI. In this sense, the informal support climate improves overall company performance. In other words, the existence of one's own formal policies is more important than the informal climate of the organization, and in particular, of supervisor support. In addition, the existence of this informal climate is irrespective of company size. Therefore, although it is less probable that small companies implement important human resources policies to formally facilitate a positive WHI, there is likelihood that they are informally carrying out these strategies.

But what is the theoretical explanation? Why do these organizational strategies increase positive consequences of WHI and therefore diminish the negative consequences of the work-home conflict and increase working performance?

When focusing on organizational strategies in general, the demand-resource model provides a reasonable explanation for increased resources (generally, responsibility) and reduced work and home demands, and this model will lead to an increased conciliation of the home and work demands. In this way, and in agreement with the Positive Psychology movement, the human resources policies in organizations would have to preferably look for the "gains spiral," and not so much for the "loss spiral," thus providing resources.

Focusing on the theoretical explanation of how a type of strategy that we have seen operates, i.e., time and place flexibility, the ecological conceptual frame (Grzywacz & Marks, 2000, as previously discussed) can provide a reasonable explanation. According to this model, the workhome mesosystem would be made up of two microsystems (home versus work) that are influenced mutually through a permeable border that allows creation of a genuine workhome mesosystem. If this border is rigid, an interaction will take place in the work-home—which is rigidly structured in time and space—and this would lead to a negative generalization in both time and energy. However, a flexible border allows workers to integrate and to superimpose responsibilities in time and space, leading to a positive generalization—that is, an instrument to obtain to a healthy work-home balance.

On one hand, companies offering benefits to favor the work-home balance can be explained with the *social inter-change theory*. This theory assumes that if organizations offer these benefits, employees will have a greater perception of support from the organization and will therefore be forced to adopt certain behaviors in return, such as citizenship behaviors, increased performance, or increased loyalty.

On the other hand, it is necessary to consider the effect of the workmates' *justice perception*, because the employees who normally enjoy the measures (especially the flexible ones) are young adults with children. What might occur is that the rest of the workmates consider these measures unfair, above all because they may lead to a work overload. In fact, to a greater extent, the youngest employees, women, and workers with small children are those who perceive work-family policies as fair.

However, results show that only one situational variable exists that influences the justice perception: interdependence of tasks, but in the opposite sense to that expected (greater interdependence, greater perceived justice). Again, Suzan Lewis offers a possible explanation: workmates are aware of the potential of the *reciprocity* of formal or informal flexibility, which they will benefit from at some time.

CONCLUSION

To conclude, we wish to emphasize the importance of integrating the work-home balance policy within the human resources policy, so that these conciliation strategies are not considered as strategies put to occasional use. As we have indicated elsewhere, it means that these strategies might be reflected in all the classic human resources management and development processes, such as the following:

Planning: A necessary stage in the process of group planning is to consider the number of employees who will look for positive WHI strategies through, for example, flexible systems.

- *Job analysis:* When analyzing jobs, it would be interesting to see the extent to which every job can be flexible through analyzing its demands.
- Labor risks prevention: In this case, the WHI and its consequences should be considered when drafting occupational hazard prevention plans and promoting health reports.
- Selection: It is necessary to take special care and to be aware of the gender stereotypes that might go against those women who wish to enjoy both home and working life. In addition, a series of dispositional variables should be evaluated (e.g., positive or negative affectivity) that will help an employee face a potentially stressing situation (like WHI) without perceiving it as a challenge or threat.
- Training: Both employees and supervisors should be trained in WHI strategies. In this sense, employees' courses could provide the skills and knowledge necessary to manage both scopes properly (i.e., conflict and time management), whereas supervisor courses should be mainly oriented to the change of attitudes (i.e., correctly evaluating the way employees select flexible work systems such as telework).
- Career planning: Human resources managers should have sufficient knowledge about balancing strategies when helping employees in their career planning. Besides, these managers should be aware of, for example, the role of identification in one scope (i.e., home) does not mean the reduction of time in the other scope (i.e., work). In addition, they should be careful with gender stereotypes, and not assume that it will always be the woman who decides to postpone her professional career in preference to family life (above all in dual-career couples).
- Performance evaluation: As already mentioned, this evaluation should be based on behaviors and not on the mere supervisor perception of performance. These subjective perceptions usually and mainly go against women with children (again, because of stereotypes) and workers with flexible work systems (given the idea that "if I do not see him or her work, I do not know if he or she works").

Other human resources management and development processes may exist in the company, such as diversity management, that should consider the WHI strategies.

In this way, the fact of including the positive WHI strategies within all the human resources management and development can create an informal climate that favors this positive interaction. As shown before, this climate actually influences the success of these strategies.

Finally, we wish to remark that many managers lose some of their best employees to the effects of *burnout*, and they do not know the reason behind this. What is clear is that when choosing a company to work for, the best employees will choose the best organizations (see www.greatplacetowork.com), those that actively develop political innovators of positive WHI. These results come from scientific research and have been reflected in this chapter. Their application to the HRM practices is now in the organizations' hands. It is a time of change—a time to look for quality of life.

REFERENCES AND FURTHER READINGS

- Amatea, E. S., & Fong-Beyette, L. M. (1987). Through a different lens: Examining professional women's interrole coping by focus and mode. Sex Roles, 17, 237–252.
- Baltes, B. B., & Heydens-Gahir, H. A. (2003). Reduction of work-family conflict through the use of selection, optimization, and compensation behaviors. *Journal of Applied Psychology*, 88, 1005–1018.
- Bandura, A. (1997). Self-efficacy: The exercise of control. New York: Freeman.
- Barnett, R. C., Gareis, K. C., & Brennan, R. T. (1999). Fit as a mediator of the relationship between work tours and burnout. *Journal of Occupational Health Psychology*, 4, 307–317.
- Bird, G. A., Bird, G. W., & Scrugs, M. (1983). Role-management strategies used by husbands and wives in two-earners families. *Home Economics Research Journal*, 12, 63–70.
- Cifre, E., & Salanova, M. (2004). Estrategias de conciliación familia/trabajo: buscando la calidad de vida laboral [Family/ work conciliation strategies: looking for the work quality life]. Estudios Financieros, 259, 111–154.
- Clark, S. (2000). Work/family border theory: A new theory of work/family balance. *Human Relations*, 53, 747–770.
- Demerouti, E., Bakker, A. B., Nachreiner, F., & Schaufeli, W. B. (2001). The job demands-resources model of burnout. *Journal of Applied Psychology*, 86, 499–512.
- Dubin, R. (1956). Industrial workers' world: A study in the central life interests of industrial workers. *Social Problems*, 4, 3–13.
- Edwards, J. R., & Rothbard, N. P. (2000). Mechanisms linking work and family: Clarifying the relationship between work and family constructs. *Academy of Management Review*, 25, 178–199.
- European Community Commission. (2006). *Report on equality between women and men, 2006*. Luxembourg: Office for Official Publications of the European Communities.
- Geurts, S. A. E., & Demerouti, E. (2003). Work/non-work interface: A review of theories and findings. In M. J. Schabracq, J. A. M. Winnubst, & C. L. Cooper (Eds.), *The handbook of work and health psychology* (2nd ed., pp. 279–312). Chichester, UK: John Wiley & Sons.
- Greenhaus, J. H., & Beutell, N. J. (1985). Sources of conflict between work and family roles. *Academy of Management Review*, 10, 76–88.
- Grzywacz, J. G., & Marks, N. F. (2000). Reconceptualizing the work-family interface: An ecological perspective on the correlates of positive and negative spillover between work and family. *Journal of Occupational Health Psychology*, 5, 111–126.

- Hall, D. T. (1972). A model of coping with role-conflict. The role behavior of college educated women. *Administrative Science Ouarterly*, 17, 471–486.
- Hall, D. T., & Hall, F. S. (1980). Stress and the two career couple. In C. L. Cooper & R. Payne (Eds.), Current concerns in occupational stress. London: John Wiley and Sons.
- Halpern, D. F., & Murphy, S. E. (2005). From balance to interaction: Why the metaphor is important. In D. F. Halpern & S. E. Murphy (Eds.), From work-family balance to work-family interaction. Changing the metaphor. Mahwah, NJ: Lawrence Erlbaum Associates.
- Hobfoll, S. E. (1989) Conservation of resources a new attempt at conceptualising stress. American Psychologists, 44, 513– 524
- Lewis, S. (2003). Flexible working arrangements: Implementation, outcomes, and management. In C. L. Cooper & I. T. Robertson (Eds.), *International review of industrial and organizational psychology* (Vol. 18, pp. 1–28). Chichester, UK: John Wiley & Sons.
- Marks, S. R. (1977). Multiple roles and role strain: some notes on human energy, time and commitment. *American Sociological Review*, 42, 921–936.
- McCubbin, H., Joy, C., Cauble A., Comeau, J., Patterson, J., & Needle, R. (1980). Family stress and coping: A decade review. *Journal of Marriage and the Family*, 42, 855–871.
- National Institute of Occupational Safety and Health. (2007). *Women's safety and health issues at work*. Retrieved August 29, 2007, from http://www.cdc.gov/niosh/topics/women/
- Piotrkowski, C. S. (1979). *Work and the family system*. New York: Macmillan.
- Rothbard, N. P., & Edwards, J. R. (2003). Investment in work and family roles: A test of identity and utilitarian motives. *Personnel Psychology*, *56*, 699–730.
- Wilensky, H. (1960). Work, careers and social integration. *International Social Science Journal*, 12, 543–560.

CROSS-REFERENCES

Factors Influencing Women Managers' Success (16) Future Directions in Labor Relations: A 2025 Perspective (17) Human Resources Management in the 21st Century (55) Flexible Labor (59)

Employee Wellness Programs (60)

Career Management (61)

Motivating Individuals and Groups at Work in the 21st Century (68) Emotion in Organizations (76)

External Competitiveness

Theoretical and Practical Facets of Strategic Pay Level Decision Making

MARK P. BROWN

Bradley University

▼ trategic pay level decisions are among the most important of organizational decisions. Indeed, even a cursory review of any business publication will likely uncover some organization's attempt to improve performance by changing its pay levels. Interestingly, although changes in pay levels make sense only to the extent they positively contribute to organizational performance, their implications are seldom easily determined. Moreover, as pay level decisions have implications in terms of both their cost and profit implications, these are decisions with profound implications that are only foolishly taken lightly. Thus, since pay level decisions have such important implications, this chapter will explore fundamental compensation decision-making questions regarding pay level determination including why firms may choose to pursue particular pay level options, how firms arrive at these options, and what facets of compensation firms consider when enacting and evaluating these decisions.

When we discuss strategic pay level decision making, we are considering what is known as a firm's external competitiveness strategies or relative wage levels. Relative wage level represents a firm's average compensation level relative to the compensation paid by other competing organizations (Gerhart & Milkovich, 1992). External competitiveness strategies are often expressed as leading, lagging, or matching the market (Milkovich & Newman, 2007). In practice, many organizations pursue more than one external competitiveness strategy. These organizations may

vary their external competitiveness strategies for different groups of jobs. For instance, some organizations may lead for positions deemed critical, whereas for less significant positions they may match or lag the market (Milkovich & Newman, 2007).

This chapter will discuss the theoretical and practical facets of establishing external competitiveness strategies. However, before we do this, we must begin our discussion of external competitiveness with an initial consideration of compensation and its strategic implications. Indeed, before we can consider external competitiveness, we must first lay some groundwork on the strategic implications of compensation practices. Importantly, this foundation will help us understand why compensation practices such as external competitiveness strategies have the potential to effect organizational performance. Most simply we must establish why compensation and external competitiveness strategies matter.

Following this, the chapter will continue with a consideration of external competitiveness and various external competitiveness strategies. Initially, we will discuss theoretical perspectives important in understanding external competitiveness and the various external competitiveness strategies. In particular, we will focus on understanding why firms might choose to pursue particular strategies. After this, we will discuss technical facets of establishing an external competitiveness strategy. Specifically, we will consider how firms determine and evaluate external salary levels such

that they establish appropriate salary levels for positions consistent with their external competitiveness strategies. Next, we will consider the components of compensation important in implementing external competitiveness strategies. When establishing external competitiveness strategies firms frequently think in the context of base cash compensation alone. Although base cash compensation is significant to the degree it represents the compensation employees can reliably depend upon in budgeting expenditures, there are other components of compensation, and these will be the focus of this section. Lastly, we will conclude with some potential direction for further consideration. The goal of this chapter is to provide an overview of external competitiveness decision making which will be helpful in understanding and further considering this topic.

STRATEGIC COMPENSATION MANAGEMENT

The notion of strategic human resource management has evolved relatively recently (i.e., within the last 25 years) in the field of management. Indeed, strategic human resource management has largely evolved because of the revelation that human resource management practices likely represent a source of organizational competitive advantage (Wright & McMahan, 1992). Sources of competitive advantage are facets of organizations that allow firms to more effectively compete versus other organizations. Thus, human resource management practices that represent a source of competitive advantage are those that have the potential to create value for a firm versus competing organizations. For instance, to the degree that a firm's human resource practices allow it to attract and retain better employees, that firm's human resource practices represent a source of competitive advantage, which allows the firm to more effectively compete versus other firms.

Although the concept of strategic human resource management has evolved only recently, this should not be construed to mean that human resource practices have not always existed in organizations—rather, the notion of strategic human resource management has evolved only recently. In the past organizations had departments tasked with the traditional human resource management functions of compensation, staffing, and training. However, in the past, these departments were primarily concerned with the technical rather than the strategic facets of their areas of expertise. Indeed, the adoption of the phrase human resource management to cumulatively describe these functions implicitly recognizes the strategic facet of human resource management practices and the potential for these activities to contribute as sources of competitive advantage. Today, we not only recognize the importance of strategic human resource management, but we also have evidence supporting its importance as research has found that firms' human resource management practices have significant implications for organizational performance.

Interestingly, of the three human resource management practices, compensation systems have been shown to play one of the more significant roles in human resource practices' affects on organizational level results (Becker & Huselid, 1998). Indeed, among the key aspects of compensation systems likely of strategic significance are those decisions related to external competitiveness. External competitiveness strategies are significant because they are critical to developing, implementing, and maintaining a compensation plan and, thus, are likely to affect important organizational outcomes and are inexorably linked to organizations' successes or failures. Illustrating the strategic significance of external competitiveness, a large consumer electronics retailer recently decided to replace its highest paid sales employees with lower paid employees. News reports suggest this occurred because managers believed these employees' contributions did not merit their high pay levels. Strategically, this organization feels their performance will be enhanced by dismissing high-performing employees and replacing them with lower paid employees. Examples such as this illustrate the complexity of external competitiveness decision making, which will be addressed in the remainder of this chapter.

EXTERNAL COMPETITIVENESS STRATEGIES

Firms may pursue a lead, lag, or match external competitiveness strategy. By pursing a lead strategy firms choose to lead prevailing market wages and pay employees more than the wages being paid to similar employees in other organizations. Conversely, firms with a lag strategy choose to lag prevailing market wages. Lastly, firms that adopt a match strategy simply match prevailing market wages. The decision whether to lead, lag, or match market wages depends upon a host of organizational and employee characteristics, which will be described in the next sections.

Lead Relative Wage Strategy

Firms will choose to pay market leading wages when the value of employees' organizational contributions are deemed to justify wages above those provided by competing organizations. One theory that is particularly useful in understanding these decisions is efficiency wage theory, which proposes that high wages may generate a host of organizational benefits. Beyond generating large applicant pools that allow organizations to be more selective when hiring, organizations that pay high wages experience increases in both employee and organizational efficiency because they are able to attract and retain the most capable employees (Akerlof & Yellen, 1986; Williams & Dreher, 1992). Illustrating this, Raff and Summers (1987) included this perspective as one explanation for Henry Ford's 1914 decision to pay employees above market wages. Although, Raff and Summers questioned the overall benefit of Ford's market wages, they do note its effectiveness in increasing Ford's employee attraction and retention.

In those cases where organizations pay high relative wages, they have likely concluded that employees' potential contributions outweigh the cost of their heightened wages. Indeed, some employee positions may be of such significance that organizations choose to pay leading wages to attract the best and brightest employees to these positions. Examples of this include the exorbitant compensation received by the top executives of some organizations. In these organizations, high wages may be pursued to attract and retain the "cream of the crop" of top management talent. These organizations likely believe that paying high wages allows them to attract and retain top executive talent that will positively influence organizational performance. Indeed, while some top executive pay packages may seem exorbitant, it is still important to recognize that the incumbents in these positions make financial decisions with consequences far in excess of their compensation. Thus, while they may seem overpaid, their high wages may make sense in the context of their organizational contribution.

Beyond organizational contribution based reasons for paying high wages, some organizations may choose to pay high wages to increase employee effort and decrease employee shirking behavior (Akerlof & Yellen, 1986). Shirking behavior is when employees perform at low levels. In particular, some organizations may choose to pursue a lead relative wage strategy in situations where employee monitoring and supervision are problematic or expensive (Cappelli & Chauvin, 1991). In these cases, organizations may find that through paying high wages employees are motivated to perform appropriately even though their performance is not being monitored. Efficiency wage theory suggests that in these circumstances high relative wages improve employee and organizational efficiency by decreasing employees' unproductive or shirking behavior (Akerlof & Yellen, 1986). Indeed, when relative wages are high, employees who shirk will suffer personal economic costs from involuntary turnover (Akerlof & Yellen, 1986). Personal costs result because employees who lose their jobs may have a difficult time finding other jobs with similarly high wages (Akerlof & Yellen, 1986; Capelli & Chauvin, 1991). For example, some organizations in the computer industry choose to pay highly skilled employees wages significantly above the prevailing industry wage for similar employees. One explanation for this, beyond the attraction and retention benefits of the high wages, may be these organizations recognition that these employees are performing activities that are difficult and expensive to monitor from a performance perspective. These employees likely possess skills and abilities that may be unique in their organizations—thus, gauging the quality of their work is highly problematic. However, by paying high relative wages, the organization creates an environment in which these employees are motivated to perform effectively absent direct supervision. Specifically, employees will be motivated to perform effectively as they desire to maintain their current wages, realizing that these wages exceed those they might receive from another organization should they lose their jobs. Consequently, a lead relative wage strategy, in addition to being useful from an attraction and retention perspective, is also useful from the perspective of employee motivation.

Related, although not considered part of efficiency wage theory, Lazear (1979) used a similar explanation to demonstrate why employees might be compensated lower than their marginal productivity (i.e., the value of their organizational contributions) early in their careers and higher than their marginal productivity later in their careers. Delayed compensation, as this is called, is attributed to the positive employee agency effects (i.e., employees acting in the best interest of their organizations) associated with these increasing wage profiles. The prospects of higher wages (i.e., efficiency wages) keep employees motivated and focused on tasks at hand and discourage unproductive activities. Prospective future higher wages are motivational because employees realize that current poor performance will eliminate their opportunities to receive higher wages in the future.

Norm-gift exchange models provide a final efficiency wage theory based explanation for relative wage practices' effects on employee and organizational efficiency. Normgift exchange models assert that, because of employee-firm exchanges, employees acquire sentiments for their firms and feel obliged to maintain equity in these exchanges. Therefore, when inequity occurs employees feel motivated to alleviate the inequity. Accordingly, one explanation for high relative wages' positive influence is that they create disequilibrium in the employee-firm relationship, resulting in increases in employee effort and efficiency. Alternatively, Yellen (1984) described this mechanism as firms paying "workers a gift of wages in excess of the minimum required, in return for their (workers) gift of effort above the minimum required" (p. 204).

To summarize, each of these explanations suggests market leading wages will generate a host of organizational benefits. Specifically, market leading wages may positively contribute to increased employee and organizational efficiency and firms may thus choose to pursue a lead relative wage strategy to positively influence organizational performance.

Lag Relative Wage Strategy

Although efficiency wage theory suggests firms will find a lead relative wage strategy most advantageous, not all organizational situations lend themselves to the use of this strategy. Indeed, while some positions may justify high wages because of their potential organizational contributions, other positions may conversely not justify high wages due to their lack of organizational contribution. Illustrating this, some jobs may give employees few opportunities to contribute meaningfully to organizational performance. In these positions, employees' efforts and abilities make little difference in the context of the organizational benefits of

their performance. Typically, in these are simple, limited complexity jobs, differences in performance have little consequence in terms of organizational performance. Accordingly, paying high wages in these positions generates little organizational benefit. Moreover, not only leading wages are unjustified but even wages that match the market are likely unjustified. The crux of these positions is that increases in organizational contribution associated with differences in employee effort and ability are so narrow that increases in performance beyond those of even the poorest performer are not justified. Simplistically, in these jobs, the compensation required to garner employee performance beyond that deemed minimally acceptable is not justified by associated increases in organizational performance.

Further supporting the effectiveness of a lag relative wage strategy, research investigating the usefulness of utility analysis in compensation decision making has demonstrated how a lag strategy may be more effective than other strategies at low organizational levels (Klaas & McClendon, 1996). In this research, other strategies were found to be inappropriate in lower level organizational positions because the impact of average or above average employees is limited by characteristics inherent in these positions. These characteristics include the limited discretion and lack of consequence for organizational goals associated with performance in these positions. Moreover, research also suggests that productivity differences based on employee quality significantly increase as job complexity increases (Hunter, Schmidt, & Judiesch, 1990). Employee productivity likely increases as more qualified employees' greater ability helps them effectively manage the discretion and autonomy that frequently accompanies more complex jobs. Unfortunately, in positions with limited organizational impact, increased wage costs beyond the lowest wage necessary to attract employees are not justified. High wages are not justified because these positions do not offer the organizational impact necessary to justify higher paid employees' greater skills and ability. Consequently, the lag strategy is more appropriate in lower impact positions as the costs associated with offering greater pay in these positions are greater than the associated benefits.

Match Relative Wage Strategy

The final relative wage strategy available to organizations is to match prevailing market wages. In practice, a match strategy is the most common relative wage strategy (Klaas & McClendon, 1996; Milkovich & Newman, 2007). Predictably, by virtue of their matching wage levels, firms pursuing a match relative wage strategy will experience similar wage level based attraction and retention benefits as competing organizations (Milkovich & Newman, 2007). Unfortunately, these firms deprive themselves of opportunities to generate relative wage strategy based sources of competitive advantage as their market consistent wages represent a poor source of competitive advantage (Milkovich & Newman, 2007). Thus, although a match relative wage

strategy does guarantee employee attraction and retention, it nevertheless fails to afford organizations the opportunity to strategically adapt pay levels for organizational benefit.

EXTERNAL SALARY LEVEL DETERMINATION

Before firms can pursue a particular external competitiveness strategy, they must first assess the prevailing wage level for a specific position. The next section will consider various facets of the process of determining appropriate prevailing wage levels upon which to base an external competitiveness strategy. Simplistically, the question at hand in this section is determining an appropriate wage level to lead, lag, or match in the context of external competitiveness.

Among the most important steps in determining an appropriate salary level for external competitiveness purposes is collecting useful salary data from the external environment. This step in the process of establishing an external competitiveness strategy has come to be known as conducting a salary survey. Although some firms conduct their own salary surveys, simplicity and restraint of trade considerations lead many firms to either hire a consulting firm to collect this data or to purchase prepared salary survey datasets. Since the most common method of collecting data seems to be prepared salary survey datasets, these sources will be the focus in this section. However, as many of the questions that must be considered when evaluating a prepared salary dataset are also pertinent to conducting a salary survey, much of the next section is equally applicable in the context of salary survey design and administration.

While prepackaged datasets appear an easy solution to determining the appropriate wage level for a particular position, effectively using them is largely a function of making appropriate comparisons in evaluating salary data across employers. Simplistically, the goal in these comparisons is to make appropriate comparisons across organizations. Although many jobs are largely similar across organizations, others are significantly different and the development of an effective external competitiveness strategy requires a careful consideration of these similarities and differences.

The most effective technique to evaluate similarities and differences among jobs across organizations is to compare their respective job descriptions. Most salary survey datasets provide generic job descriptions for the positions included in the dataset. By evaluating these job descriptions versus the job description of the position being priced, similarities and differences between salary survey jobs and the positions of interest can be determined. Once the jobs under consideration seem similar, the next task becomes one of determining how appropriate across firm comparisons are.

Evaluating the appropriateness of across firm job comparisons involves a consideration of the size, location, and industry of the organizations whose jobs are included in the survey. Although jobs may be quite similar in terms of their job descriptions, significant salary differences may

exist based upon a firm's size, location, or industry. For instance, in terms of location, some positions are recruited on a local or regional level, whereas other positions are recruited on a national or international level. Thus, a firm hiring administrative assistants in Boston would most appropriately consider salary data for administrative assistants in Boston or New York as administrative assistants are typically recruited on a local or regional level. Conversely, when setting wages for jobs recruited on a national or international level more appropriate comparisons are similar jobs wherever they are located. Consequently, when recruiting a CEO in Boston salary comparisons to CEOs working in Los Angles or even Hong Kong now make more sense. Additionally, when making comparisons at the national or international level, consideration must also be given to cost of living differences as these differences may potentially influence the accuracy of comparisons. For instance, even though they are both large cities, substantial differences in the cost of living exist between Chicago and London (i.e., one of the most expensive cities in the world for business) and these differences must be considered when establishing externally competitive wages.

Beyond location, considerations of firm size and industry are also important in terms of determining appropriate salaries for comparison purposes. In terms of size, large firms typically pay higher wages than smaller firms pay. Thus, when performing external salary comparisons, firm size (which is typically included in most salary survey datasets) should also be considered. Lastly, the industry in which comparisons are being made must also be considered. For instance, firms in high-tech industries typically pay higher wages than firms in less technologically intensive industries pay. Thus, a technologically intensive firm wishing to hire a computer programmer should cautiously consider salary data on computer programmers derived from nontechnology intensive industries as these firms' salaries may be lower than those of technologically intensive industries.

COMPONENTS OF COMPENSATION

Having considered potential external competitiveness strategies and considered how firms determine external salary levels, this chapter will next consider how firms implement their external competitiveness strategies in the context of the various components of compensation. Indeed, as firms have sought to effectively manage their external competitiveness strategies to increase their competitive advantage significant attention has begun to be focused not only on the external competitiveness strategy itself but also on components of the strategy (Milkovich & Newman, 2007). Typically, this mix of compensation components is refereed to as an organization's pay mix. Pay mix data is included in most salary surveys and salary survey datasets.

When we consider the components of a firm's external competitiveness strategy, we are evaluating the various types of compensation that make up employees total compensation. Indeed, just as firms my lead, lag, or match the market in terms of base compensation, they may also lead, lag, or match the market in terms of the other components of compensation. In the next section, this chapter will discuss the various potential types of compensation and how firms might choose to strategically manage these (i.e., lead, lag, or match) in the context of their external competitiveness strategies.

The components of pay can be broadly thought of in terms of cash and noncash components. Cash components of pay include both base salary and incentive or bonus pay. Noncash components of pay include both income protection benefits (e.g., health insurance, retirement benefits, etc.) and work-life balance components (e.g., sick leave, vacation, etc.). Although issues of external competitiveness are often thought of only in terms of base pay, the other components of pay also have significant implications in terms of external competitiveness decision making.

An employee's level of base pay describes the consistent pay employees receive for performing a job on some periodic basis. Base pay is the fundamental compensation employees receive for performing a job. Typically, base pay is determined prior to an employee's beginning a job. Employees' base pay changes over time due to modifications made to accommodate increases in the cost of living or to reward employees for good performance. From an external competitiveness perspective, base pay is among the most pertinent of all elements of employee compensation. Base pay is important in the context of external competitiveness because with a few exceptions (e.g., high-level managerial/ professional employees, employees compensated largely in terms of commission) it frequently represents the largest component of employee compensation and thus has the greatest impact on employees. Consequently, to the extent a firm pursues a particular external competitiveness strategy the strategy will often be enacted in terms of employees'

Although an organization's decisions in terms of base pay are likely the most significant components of a firm's external competitiveness strategies, the importance of the other components should not be underestimated. For instance, beyond base pay, incentive compensation is also important in the context of external competitiveness. Incentive compensation represents the component of employees' cash compensation that is not fixed over time. Typically, incentive compensation varies over time based upon employee performance. Incentive compensation is interesting from an external competitiveness perspective as firms' choices to pursue particular external competitiveness strategies may indicate particular behaviors they desire from employees. Indeed, it is common for firms to pursue external competitiveness strategies in terms of incentive compensation that differ from their strategies in terms of base pay.

External competitiveness strategies in which a firm pursues different strategies for various components of compensation are known as hybrid external competitiveness strategies. For instance, a firm that wants to motivate

particular behaviors may enact a hybrid external competitiveness strategy with market leading incentive compensation but market lagging base wages. Examples of firms that might pursue this strategy include those pursing a salesdriven organizational strategy. These organizations might choose to compensate employees largely in terms of commissions and thus focus on incentive compensation while de-emphasizing base compensation. These firms emphasize incentive compensation to elicit the behaviors being incentivized. Conversely, firms less interested in incentivizing behavior might provide either no incentive compensation or incentive compensation that merely lags the market. In the case of the lagging incentive compensation, the low incentive compensation usefully drawing employees' attention to the incentivized behavior while nevertheless not influencing their behavior as profoundly. Illustrating this, some firms that compete against sales-driven organizations may instead choose to pursue a customer service driven strategy. In the context of their strategy, these firms may choose to de-emphasize sales-driven incentives believing customer service is better fostered when employees are less focused on sales. Thus, these organizations, while lagging on incentive compensation, might choose to lead on base compensation to attract high-quality employees who will excel in terms of customer service. Ultimately, the key issue with incentive compensation remains the degree to which a firm wishes to incentive particular behaviors in the context of its incentive compensation.

The noncash or benefits components of compensation include the tangible rewards employees receive beyond the cash components of their compensation. The benefits components of compensation can be broken down into income protection and work-life balance components (Milkovich & Newman, 2007). The purpose of income protection elements is to assure employees' health and income. Typically, income protection benefits include elements beyond those mandated by the government (e.g., social security, Medicare/Medicaid, and workers compensation insurance) such as health insurance and retirement benefits. Work-life balance benefits are those benefits designed to help employees balance their work and family obligations. Typically, work-life balance elements include benefits such as sick leave, child-care assistance, and vacation.

Just as firms' may choose to pursue particular pay strategies with the other components of pay, firms may also choose to pursue specific strategies in terms of their benefits. Firms may choose a particular external competitiveness strategy in terms of their income protection and worklife balance offerings for a host of strategic or economic reasons. For instance, to increase employee attraction and retention, firms may signal they are an organization that cares about employees by leading the market in terms of their income protection offerings. Similarly, large firms may chose to offer lucrative health care benefits as their large size allows them to efficiently purchase employee health care benefits. Indeed, large organizations may be able to offer employees substantial cost savings in terms of

some benefits (e.g., health insurance, life insurance, etc.) versus the costs employees would incur if purchasing these benefits individually.

Increasingly, some firms have started offering employees significant choices in terms of their benefits. Plans where employees are allowed to choose among their benefits options are known as *cafeteria plans* (Milkovich & Newman, 2007). The notion behind cafeteria plans is that employees will be more satisfied when they are able to select those benefits that they deem most appropriate to their particular circumstances. Although intuitively compelling, cafeteria plans must be cautiously considered, as they may be both administratively complex and expensive. Moreover, to the degree that they offer employees the opportunity to choose potential benefits, cafeteria plans may also be troublesome as employees can make costly and problematic mistakes in their benefits choices (Milkovich & Newman, 2007).

In terms of the work-life balance components of compensation, some firms may offer their work-life balance components to attract a particular group of employees. For instance, working parents may find employment challenging as it conflicts with their child rearing responsibilities. However, organizations that provide child care services may alleviate the role conflict associated with working parents multiple responsibilities.

Ultimately, the key to understanding employee benefits from an external competitiveness perspective is recognizing firm's potential cost effectiveness in providing these benefits and their usefulness in attracting, retaining, and motivating employees.

FURTHER CONSIDERATIONS

External competitiveness is but one part of an organization's overall compensation strategy. In addition to external competitiveness considerations, issues of internal salary alignment, the design of pay for performance plans, and the administration of the overall pay system are also important. Of these areas, internal salary alignment seems a particularly pertinent area of consideration for those interested in further expanding their knowledge of compensation topics beyond external competitiveness.

Internal salary alignment considers pay relationships between employees inside an organization versus the external relationships considered by external competitiveness. Whereas external competitiveness considers salary comparisons across organizations for employees performing similar work, internal alignment considers salary comparisons inside organizations for employees doing different types of work. Moreover, just as external competitiveness has significant implications for individual and organizational performance, internal alignment has equally important implications.

Knowledge of internal salary alignment is particularly useful in the context of external competitiveness as these two facets of a compensation system simultaneously interact to explain the compensation employees receive.

Although it is possible to determine employees' compensation based solely on external salary data, doing so neglects the importance of internal pay relationships and the effects these relationships have on individual and organizational performance. Thus, individuals wishing to further their knowledge of compensation would be well advised to delve into the literature on internal salary alignment.

SUMMARY

This chapter has considered theoretical and technical facets of the strategic pay level decision-making process. Strategic pay level decisions are those made in the context of organizations' external competitiveness strategies. Various external competitiveness strategies and techniques useful in arriving at appropriate external competitiveness strategies have been presented. External competitiveness strategy options presented include those of either, leading, lagging, or matching prevailing market wages. The chapter notes that external competitiveness strategies may be enacted at either the organizational or the job family level. Moreover, the chapter also observes that external competitiveness strategies may vary across the components of compensation. The components of compensation considered include monetary (e.g., cash and incentive compensation) and nonmonetary elements (e.g., income protection benefits and work-life balance benefits). The chapter closes with a suggestion that those with a further interest in this topic next consider the internal alignment facet of compensation systems as this literature, in combination with external competitiveness considerations, further elucidate the performance implications of employee compensation.

REFERENCES AND FURTHER READINGS

- Akerlof, G. A., & Yellen, J. L. (1986). *Efficiency wage models of the labor market*. Cambridge, UK: Cambridge University Press.
- Becker, B. E., & Huselid, M. A. (1998). High performance work systems and firm performance: A synthesis of research and managerial implications. *Research in Personnel and Human Resources Management*, 16, 53–101.
- Bloom, M. C., & Milkovich, G. T. (1996). Issues in managerial compensation research. In C. L. Cooper & D. M. Rousseau (Eds.), *Trends in organizational behavior* (Vol. 3, pp. 23–47). New York: John Wiley & Sons.

- Boudreau, J. W., & Berger, C. J. (1985). Decision theoretic utility analysis applied to external employee movement [Monograph]. *Journal of Applied Psychology*, 70(3), 581–612.
- Campbell, C. M. (1993). Do firms pay efficiency wages? Evidence with data at the firm level. *Journal of Labor Economics*, 11(3), 442–470.
- Cappelli, P., & Chauvin, K. (1991). An interplant test of the efficiency wage hypothesis. *The Quarterly Journal of Economics*, 106(3), 769–787.
- Gerhart, B., & Milkovich, G. T. (1992). Employee compensation: Research and practice. In M. D. Dunnette (Ed.), *Handbook of industrial and organizational psychology* (Vol. 3, pp. 481–569). Palo Alto, CA: Consulting Psychologists Press.
- Gerhart, B., Trevor, C. O., & Graham, M. E. (1996). New directions in compensation research: Synergies, risk, and survival. In G. Ferris (Ed.), Research in personnel and human resource management (Vol. 14, pp 143–203). Greenwich, CT: JAI Press.
- Hunter, J. E., Schmidt, F. L., & Judiesch, M. K. (1990). Individual differences in output variability as a function of job complexity. *Journal of Applied Psychology*, 75(1), 28–42.
- Klaas, B. S., & McClendon, J. A. (1996). To lead, lag or match: Estimating the financial impact of pay level policies. *Personnel Psychology*, 49(1), 121–141.
- Lawler, E. E. (1990). Strategic pay. San Francisco: Jossey-Bass.Lazear, E. P. (1979). Why is there mandatory retirement. Journal of Political Economy, 87(6), 1261–1284.
- Milkovich, G. T., & Newman, J. M. (2007). *Compensation*. Chicago: Irwin.
- Pfeffer, J. (1994). Competitive advantage through people. Boston: Harvard Business School Press.
- Raff, D. M. G., & Summers, L. H. (1987). Did Henry Ford pay efficiency wages? *Journal of Labor Economics*, 5(4), S57–S86.
- Rebitzer, J. B., & Taylor, L. J. (1995). Efficiency wages and employment rents: The employer-size wage effect in the job market for lawyers. *Journal of Labor Economics*, 13(4), 678–707.
- Williams, M. L., & Dreher, G. F. (1992). Compensation system attributes and applicant pool characteristics. *Academy of Management Journal*, 35(3), 571–595.
- Wright, P. M., & McMahan, G. C. (1992). Theoretical perspectives for strategic human resource management. *Journal of Management*, 18(2), 295–320.
- Wright, P. M., McMahan, G. C., & McWilliams, A. (1994). Human resources and sustained competitive advantage: A resource-based perspective. *International Journal of Human Resource Management*, 5(2), 301–326.
- Yellen, J. L. (1984). Efficiency wage models of unemployment. *American Economic Review*, 74(2), 200–205.

FLEXIBLE LABOR

NICOLE TORKA AND MARTIJN VAN VELZEN *University of Twente*

his chapter deals with one of the most discussed topics among contemporary management practitioners and scholars: flexible labor. We present an integrated framework and discuss numerical flexibility (i.e., work time and nonpermanent employment relationships) as well as functional flexibility (i.e., external and internal employability) and their interrelationships. In this context, drivers and consequences of flexible labor play an important role for both firms and workers. The chapter begins with an outline of prominent theoretical frameworks of flexible labor. Next, the different forms of flexible labor will be presented in detail. This chapter not only offers an overview of relevant academic literature from different disciplines (e.g., labor economics, labor law, human resource management [HRM], psychology, and sociology) but, given the global relevance of the flexibilization of labor, we have also made a point of giving it a strong international character.

INTRODUCING FLEXIBLE LABOR: FIRM DEMANDS AND WORKER NEEDS

The technological changes in processes and products, the shortening of product life cycles, the increase in competition under price pressure, and the intensified international competition have changed the preconditions for organizational vitality since the 1970s. According to Bolwijn and Kumpe (1990), survival nowadays can be ensured by a

combination of price, quality, flexibility, and innovation. In this chapter, the focus is on one such market requirement: flexibility. Flexibility is seen here as a precondition for the other mentioned pillars of organizational success. As a managerial task, flexibility involves the creation or promotion of capabilities for dealing with situations of unexpected disturbance. Companies can enhance firm maneuverability with different strategies: flexibility in procedures, in volume and mix of products, in speed, in technology, in organization structure, and in culture (Volberda, 1996). Here we focus on flexibility in the form of moveable human resources. In order to deal with all other areas of flexibility adequately, employees have to adapt to changes appropriately and quickly. Based on Blyton and Morris (1992, p. 116) and Atkinson (1985, p. 3), the following definition of flexible labor can be formulated: the ability of management to vary the use of the factor labor in a company according to fluctuations and changes in production activity and according to the nature of that activity itself.

At least in Western Europe, monetary yields as well as working time, labor contract, and health and safety at work are strongly anchored in labor law and collective agreements between employer and employee representatives. Thus, organizations' demands for flexible labor are restricted by external, institutionalized forces (see Looise, van Riemsdijk, & de Lange, 1998). For this reason, when the different forms of flexible labor are elaborated on here in detail, the relevant regulations associated with them will be

highlighted. But before proceeding to the detailed presentation of the different forms of flexible labor, an outline of these forms will be presented in the following paragraph.

A Framework for Flexible Labor

Schilfgaarde and Cornelissen (1988) presented a framework that encompasses different forms of flexible labor. The authors differentiated between two dimensions of flexible labor: (a) numerical versus functional and (b) internal versus external. The first dimension deals with the difference between the adaptability of the production activity (numerical flexibility) and the adaptability of the nature of that activity (functional flexibility). The second dimension concerns the use of employees for realizing numerical and/or functional flexibility. Employers can enhance the flexibility of their staff (internal labor market), can hire employees temporarily, or can subcontract and outsource labor (external labor market). Thus, four forms of flexible labor can be distinguished, and within each form, different instruments do exist.

From the firm perspective, numerical flexibility is usually seen as a strategy to reduce labor costs; functional flexibility is usually linked to an increase in quality and innovation. However, from the perspective of the workers, flexible working times as well as employability (internal functional flexibility) are often seen as beneficial. With respect to the former, firms help workers realize work-life balance. Thus, firm demands and worker needs seem to meet in both forms of internal flexibility. In contrast to this, many authors seem to believe that external numerical flexibility is favorable only for firms, as if nonpermanent employment relationships, particularly those involving workers who are not considered high professionals, are based purely on organizational demands. In this chapter, both of these and other rather extreme viewpoints will be put into perspective.

The most influential model describing firm strategies for managing flexible labor is the dualistic model of the flexible firm proposed by Atkinson (1984, 1985). His coreperiphery model has been the subject of much research and

Table 59.1	P.1 Forms of Flexible Labor	
	Numerical	Functional
Internal	Part-time work Flexible working times Shift work Overtime	Task broadening Task rotation Task enrichment (Semi-)autonomous teams
External	Agency workers Freelancers Fixed-term contracts Workers borrowed from firms Outsourcing Subcontracting	Highly skilled agency workers, consultants, and freelancers

SOURCE: Based on Schilfgaarde and Cornelissen, 1988.

debate. According to the author, firms try to establish a relatively small core of full-time employees with job security who conduct the organizations' key activities and have high levels of functional flexibility, good development and career opportunities, and excellent monetary benefits. At the same time, organizations externalize a thick layer of noncore activities or persons, also called peripheral activities and workers. Noncore workers receive only a temporary commitment from the firm—that is, temporary contracts or agency work. They receive less attractive material and immaterial benefits from the user firm—that is, few or no opportunities for challenging tasks, reduced internal mobility, and limited (fringe) benefits. Thus, organizations can adopt a mixed strategy, trying to obtain all forms of flexibility simultaneously. It is also assumed that the periphery protects the core from fluctuations and changes in numerical production activity. The commitment necessary for working beyond contract can and will be developed and is exclusively expected from only the core workers. Those who have a permanent position in the firm receive all of the HRM conditions known to be drivers of commitment and these workers consequently exhibit behavior that contributes to organizational well-being. However, Dutch research has shown that external flexibility does not exclude functional flexibility within the firm. The firms established long-term relationships with good agency workers: Many of the agency workers had worked for the companies for years, being hired repeatedly in peak periods. After the initial period (6 months), agency workers conducted the same firm-specific activities and received equal opportunities for task rotation, task enrichment, and (paid) education and training as their core colleagues with a regular contract (Torka, 2004). In the next sections, different forms of labor flexibility will be discussed in detail—bearing in mind that they are less "worlds apart" than at first may be suggested.

INTERNAL NUMERICAL FLEXIBILITY: WORKING TIME

Without changing the workforce size, firms can adjust the volume of hours worked in a company simply by letting incumbent workers work more or fewer hours than the standard (agreed upon) amount. Overtime work is probably the best known and oldest example of an internal numerical flexibility tool. Temporary working-time reduction is another. When working-time reduction becomes a permanent, structural feature of a job or employment relationship, it takes the shape of part-time work. In this section, however, we will focus on measures that temporarily adjust the number of hours worked in a firm.

Why Internal Numerical Flexibility: A Firm and Worker Perspective

Working-time flexibility is a common flexibility tool for many firms in several northwest European countries. Employers rely on this type of internal flexibility because external flexibility options are limited, either by law (high levels of employment protection) or through self-regulation (substantial terms of notice in collective agreements). An industry where working-time flexibility is particularly dominant is the logistics industry. High levels of flexibility, which are sometimes hard to predict, characterize this industry. Instead of adjusting the size of the workforce to changing market demands, logistics companies can opt to vary the volume of working hours. Incumbent employees work longer hours during peak periods and take time off when business is slow. Examples from Danish firms show that extra hours worked are stored in a virtual hours account. Rather than receive monetary compensation for the overtime work, employees can draw time from these accounts. Typically, these hours can be spent as paid leave during periods of low customer demand. Ideally, the periods when workers want to take time off (e.g., for vacation, education, care of dependents) coincide with the slow business spells. In the Danish examples, employees negotiate with line managers and/or HR staff in order to coordinate their preferences with the company staffing needs (Van Velzen, in press). Negotiations take place within the boundaries set by the collective agreement. Average weekly hours are consolidated for a longer period, sometimes up to one year. This annualization provides companies with the possibility to redistribute available working hours over peak and slow periods. This practice is taken one step further in several Swedish organizations (e.g., hospitals, apparel manufacturing, consumer electronics), where software-supported "self-rostering" enables employees to realize a work-life balance, while at the same time providing the company with working-time flexibility.

It is important to realize that, particularly since the beginning of the 21st century, much of the working-time flexibility in European countries has been regulated through legislation (e.g., Austria and France), collective agreements (e.g., Danish banking industry and German printing industry), and company agreements (e.g., Belgium and the Netherlands). In some countries, working-time flexibility has been initiated by firms, often in return for job-security guarantees (e.g., in several high-profile firms in Germany). Increasingly, working-time flexibility also serves worker purposes, notably in cases where workers want to better combine work and private duties, the so-called work-life balance, for instance in Austria (Thornthwaite & Sheldon, 2004). These European initiatives should be seen in light of the Employment Guidelines, which were drafted by the European Commission. Since the late 1990s, these annual guidelines have called for a modernization of work including flexible working arrangements in which company productivity and competitiveness is improved, yet a balance between flexibility and security is simultaneously facilitated. Working-time flexibility is seen by the European Commission as a potential tool for realizing such a balance. Thus, while at the micro level, companies and workers are coming up with ideas, preferences, and desires to make

working time more flexible, a supranational coordination mechanism supporting an integrative approach of workingtime flexibility is becoming more and more visible as well.

Internal Numerical Flexibility: Consequences for Firms and Workers

Let us stay with the widespread use of various workingtime flexibility scenarios in Europe. When faced with the economic shocks in the 1970s and 1980s, European employers did not lay off workers but, instead, pressured by the unions, introduced working-time reduction schemes and work sharing (e.g., France, Germany, and the Netherlands). Then, according to Alesina, Glaeser, and Sacerdote (2005), a "social multiplier" may have triggered a further reduction of working hours economywide. They conclude that this social phenomenon has resulted in Europeans deliberately working fewer hours than their American and Japanese counterparts would. Furthermore, the European workers appear to be very happy with this state of affairs. This may possibly be reflecting an awareness among European workers, for instance, that issues such as time squeeze and work-life balance need to be addressed much more so than the pursuit of material wealth.

This may help explain the willingness of workers to accept more flexibility, but only if work-life preferences can be realized through such a strategy. The realization of these preferences partly depends on the bargaining position of workers (and is thus dependent on the labor market situation), but also on the HRM of individual firms.

The outcome of so-called Damocles bargaining (take it or leave it) is a flexibility strategy that only serves the company's need. Worker preferences are not taken into account. Working-time flexibility provides an opportunity for companies to not only retain, but also motivate incumbent workers. The tendency of many firms in Europe to explore the possibilities of this type of numerical flexibility suggests that companies are not only increasingly aware that corporate social responsibility start in the own firm. It also hints at a corporate sensibility, given the demographic fact that skilled and motivated workers will be harder to find in Europe.

INTERNAL FUNCTIONAL FLEXIBILITY: EMPLOYABILITY WITHIN THE FIRM

In this section, we deal with internal functional flexibility, defined as the flexibility that one can assume is directly linked to the workers task content and development opportunities, as well as to organizations' decisiveness to respond accurately to changes related to quality issues. Functional flexibility is strongly linked to internal labor markets: getting the job done with the same staff, even when products and production changes. Changing organizational demands requires internal employability from employees, which can be linked to horizontal (a different but not more difficult

job) and vertical (a different and more complex job) mobility at the current employer. When aiming for task broadening, different tasks with the same degree of complexity get integrated: Workers have to carry out more tasks. Task rotation concerns the exchange of tasks between workers, but the level of difficulty remains the same. Contrary to both mentioned forms of functional flexibility, task enrichment includes the qualitative improvement of work: Workers not only perform executive tasks, but they also get responsibilities for preparation, control, and so on. While broadening, rotation, and enrichment refer to task restructuring on the level of an individual employee, (semi-)autonomous teams refer to changes in the quality of work for groups of workers: As a group, they become responsible for a part of the production process. The group is supposed to lead itself, although the supervisors stay responsible.

Why Internal Functional Flexibility: A Firm and Worker Perspective

To increase cost effectiveness, many Western companies have outsourced their noncore activities to low-wage countries, but competing in terms of price is not enough nowadays to take part in the fierce international contest. Technological and market developments have often forced organizations to meet higher requirements such as quality and innovativeness. Both requirements are interwoven with knowledge intensification, and as a result, firms have to invest in their human capital in order to guarantee optimal adaptability to these types of demands. While the need for semiskilled and unskilled workers is decreasing, qualifications required for new and existing jobs become higher. This new deal is well known as employability: Workers are expected to adapt easily to the changing upgraded demands. Functional flexibility is assumed to have a positive relationship to the quality of work. It is important to note that some authors argue that the link between an increased quality of work and quality and innovation improvement is an indirect one: It is believed that challenging, complex, and integrated tasks lead to enhanced attitudes (e.g., job satisfaction and commitment) and, thereby, to employee behavior that contributes to firm improvement.

A changing labor market is a second factor that favors an internal functional solution. The current and future labor market situation makes internal functional flexibility increasingly inevitable. Although the labor market is still quite extensive in many countries, certain industries and companies (already) suffer from a lack of qualified employees. Due to the aging Western society and the change in employee preferences, the lack of qualified staff will continue to grow. Because of this, not only do Australia, the United States, and New Zealand have Green Card policies for attracting immigrants with highly desired, rare qualifications and skills, but Western European countries do as well. In Germany, for example, although the unemployment rate approached 10% in January 2007, there is a clear lack

of skilled workers. According to the Cologne Institute for Business Research, about 20,000 jobs that require highly skilled workers are not filled because of a shortage of skilled labor. The problem is particularly evident in health care, corporate management, engineering (especially the IT sector), and other technical occupations. Social partners (employers and unions) and government aim for solutions outside of firms (e.g., revising and softening immigration laws and raising the retirement age) as well as solutions inside firms. Concerning the latter, it is assumed that companies have to provide not only flexible working times but also further training for the existing labor force. This means that workers have to be prepared for an enhanced internal functional flexibility.

From the perspective of the workers, two arguments for internal functional flexibility can be identified: (a) humanization of work and (b) increased opportunities on the internal and external labor market. Tayloristic work (the splitting of tasks into small pieces of routine and boring work and a sharp division between execution and control), which is accompanied by a "homoeconomicus" portrayal of mankind (the only motivators are financial incentives), can be seen as dehumanizing: Mankind is a (detached) continuation of the machine. Therefore, rebuilding tasks can be characterized as "humanizing." Furthermore, due to organizational investments into the workers' capabilities, workers can benefit from their enhanced competences and skills. It will be easier for them to find a job within or outside of the current employer. Concerning the latter, a firm takes risks when it invests in workers usability.

However, according to Boltanski and Chiapello (1999), employment relationships have changed to "cité par projets"—from long-term mutual loyalty relationships to short-term business connections based on projects. They propose that the so-called new deal is lopsided. For the worker, this means that employability in general—and, thus, other forms of flexibility—are not a voluntary choice based on emotional persuasion or identification, but based on necessity. Employees have to adapt.

Internal Functional Flexibility: Consequences for Firms and Workers

In HRM literature, firms offering challenging and complex jobs in combination with a continuous improvement of workers' competences are often labeled as high-commitment or high-performance work organizations. This means that, if management invests into workers, organizational prosperity will be a direct and logical consequence. However, the contribution of functional flexibility to quality and innovation is not self-evident, making the *how* question a central one. Not all forms of functional flexibility can be linked to workers' and firms' enlightenment. Herzberg (1968) argued vehemently against task broadening and rotation. According to Herzberg, both interventions have nothing to do with a qualitative enhancement of the quality of work, but only

with an increase in the volume of work for the worker. As a consequence, such changes will not contribute to motivation and commitment but to more work-related pressure and stress. According to him, only better jobs (enrichment) will lead to outcomes desired by firms and workers. Research by Goudswaard, Kraan, and Dhondt (2000) supports Herzberg's assumption. For workers who rotate over tasks on a regular basis or who experience a broadening of tasks, task demands are higher and autonomy is lower, and as a consequence, the risk of being subject to work pressure is higher than it is for workers without these regular switches. Workers who take over supervisor tasks (task enrichment) experience higher risks of emotional exhaustion, although this can be partly absorbed by the increase in autonomy and the opportunity to learn. However, not all human beings are looking for occupational advance. People do differ and have individualized needs when referring to occupational advancement. Taking all of the aforementioned into account, successful functional flexibility depends greatly on management's ability to identify individual worker needs. In other words, obliged task improvement can result in contraproductive employee behaviors and unforeseen, negative company results.

EXTERNAL NUMERICAL FLEXIBILITY

IBM has halved its number of direct employees from 440,000 to 225,000 worldwide but we still have the same overall number of jobs as before, around 500,000. We have just shifted their status. The group will never go back to full employment in any way. It got its fingers too badly burned in the 1980s. (Peter Hagger, as cited in K. Purcell & J. Purcell, 1998)

Statistical evidence on a larger scale supports the changes in employment relationships reflected in this comment. Employment through temp work agencies (TWA), self-employment, and fixed-term contracts seems to have experienced a steady growth in almost all European countries, the United States, and Australia. Over the past 15 years, temp agency work has at least doubled in nearly all European countries (Storrie, 2002). In contrast to European countries, there are no regulations in the United States for the agency industry at the federal level. Despite this fact, the Netherlands has one of the highest percentages of agency workers in the world (2.6%), surpassed only in the United Kingdom (5%). In absolute size, the largest staffing market is that of the U.S. economy (43%). Olsen and Kalleberg (2004) concluded that Norwegian firms make greater use of nonstandard arrangements than U.S. firms. They name the following two reasons, both of which apply to other European countries as well: the more restrictive regulations on dismissal and the generous access to leaves of absence.

In this section, all employment relationships that are different from a permanent, regular one are named *non-*

permanent or atypical. Temping relationships refer to contractual triangles—a ménage à trois—between one employee, one employer, and a client organization such as a temp agency work, personnel on loan, or labor pools. While fixed-term employees and freelancers are temporarily on the company payroll, workers under a temping relationship have an employment contract with a temp agency or contract company and are hired out via a commercial contract to perform work assignments at the user firm. Most research has been done among agency workers. Knowledge about other temping relationships is very limited.

Atypical employment relationships include highly skilled (e.g., consultants) as well as low-skilled (e.g., manufacturing) workers. However, highly skilled but fixed-term labor is not hired because of fluctuations in standard (production) demands but because of fluctuations of a nonstandard nature: These workers possess certain knowledge and/or skills that are not available and needed typically and permanently within the company, but only for a certain period. Their so-called external functional flexibility will be discussed in the next paragraph. In this paragraph, the central focus is on the average, low- to medium-skilled, nonpermanent worker. After discussing insourcing (the use of agency staff) and other forms of atypical employment relationships in detail, we go into the other management strategies of external numerical flexibility: outsourcing, subcontracting, and offshoring.

Why External Numerical Flexibility: A Firm and Worker Perspective

So why do companies seem to hire more atypical workers than in the past? The number one argument is clear: reducing (labor) cost risks under uncertainty. Atypical workers are not necessarily cheaper than one's staff is, but in the case of agency workers or freelancers, client organizations have to pay only for worked hours or fulfilled assignments. For many firms, the amount of workers needed differs over the year and sometimes within a month or even a week (peak and dale periods). Nonpermanent workers can also replace sick, pregnant, or on holiday permanent staff. However, the question of replace ability depends strongly on the nature of the job. For example, finding a temporary stand-in for a secretary, assembly worker, or someone with more generalist knowledge and skills will be easier than replacing an employee with rather rare and/or firm-specific competences. Both reasons, cost effectiveness and temporary replacement, can be characterized as defensive or reactive. Two proactive or strategic motives for nonpermanent and agency work in particular can be identified: (a) as buffer for the own, regular personnel and (b) as a trial period for intended permanent staff. Concerning the latter, in Europe, dismissal is more difficult than in the United States due to stricter regulation. Furthermore, when offering a permanent or fixed-term contract, the probation period is also shorter. In the Netherlands, the maximum probation period is 2 months. Only within this period can employer or employee terminate the contract without any consequences. However, after this period, dismissal is more difficult due to regulated terms of notice and, at least for the Dutch situation, the involvement of the labor court. According to Berkhout and Van Leeuwen (2004), the three main *firm* motives for atypical work and especially agency work are flexibility, costs, and screening.

Berkhout and Van Leeuwen (2004) went on to describe the three *worker* motives as employability, harmonization, and screening. Employability refers to the gaining of work experience and the relative ease of finding a nonpermanent job. For younger and unemployed workers, temporary work can act as a kind of stepping-stone toward permanent employment (e.g., Finegold, Levenson, & Van Buren, 2003).

Harmonization deals with the supple combination of different life spheres. For example, harmonization between employment and education (many agency workers are quite young), employment and family life, employment and leisure interests. The harmonization motive is strongly connected to the agency work flexible working hour's relationship: Temporary contracts are more common among part-time than among full-time workers.

Through screening, employees get a chance to work for different employers and therefore can choose the best. This motive may be better realized under tight labor market conditions than during economic recessions. Employees can also suspend important lifetime choices through contingent work.

External Numerical Flexibility: Consequences for Firms and Workers

In the literature, the disadvantages of atypical employment for the knowledge society and for firms are placed in the foreground. It is stressed that the cost savings resulting from agency work or other forms of external numerical flexibility may be beneficial for companies, but only in the short term. In the long term, when aiming for strategic targets such as quality and innovation, hire and fire practices will be disastrous. A substantial number of HRM scholars are convinced that decreased opportunities for lifetime employment change the employment relationship and, more specifically, change the underlying psychological contract concerning demand and supply. It is assumed that the expectations between employers and employees transfer from a relational (long term) into a transactional (short term) psychological contract based on monetary exchange. As a consequence, worker attitudes will change from being commitment driven to being economically driven (e.g., Rousseau, 1995). Since it is assumed that a committed workforce is necessary for stimulating and grasping quality, as well as enhancing innovativeness, some scholars, not surprisingly, are convinced that nonpermanent work cannot be advantageous for firm effectiveness in the long term.

Nonpermanent work seems to have many negative consequences for employees as well. For example, much research shows that agency workers have less attractive HRM conditions (e.g., contract security, salary, and job characteristics) than employees with a permanent contract do. On a more general level, Letourneux (1998) concluded that the labor conditions of nonpermanent workers are worse than those of employees with a permanent contract are. He argued that it is more physically demanding work involving repetitive tasks, nuisance work, monotonous work, and fewer opportunities for developing skills. In a Dutch/United States comparison for the IT and building industries, Van Velzen (2004) showed the many challenges and few possibilities for flexible workers to receive training that keeps them employable. All of the previously mentioned conditions are sources or antecedents of job satisfaction and commitment. Therefore, the assumed relationship between contingent work, employee attitudes, employee well-being, and organizational effectiveness seems logical. But is it also true?

External Numerical Flexibility: Challenging Common Sense and Research Findings

Little research challenges the previously mentioned relationship, but some of the few provocative results will be presented here. To begin with, a challenge to the nonpermanent work/bad job link can be found in the research conducted by Saloniemi, Virtanen, and Vahtera (2004, p. 203), which showed that fixed-term employment does not indicate social exclusion, low-job control, nor high-job demands. Moreover, exposure to high strain was more common among permanent than among nonpermanent employees. Casey and Alach (2004) reported reasons mentioned by agency workers as to why agency work is not inevitably worse than permanent employment:

Many report that they choose to temp as an escape from the "stresses and abuses," and the "politics" often experienced in permanent employment roles in organizational workplaces. Some reported their wish to avoid the responsibilities and commitments and management practices incumbent in permanent positions. Others reported their wish to alleviate the boredom of routine clerical jobs and their disaffection with conventional jobs by opting for variety and discontinuity with different employing organizations. (p. 468)

Thus, the previously mentioned positive effects of agency work can be understood as triggers for voluntary nonpermanent work (for more reasons, see Torka & Schyns, 2007). With this in mind, external numerical flexibility can also be seen as meeting both employer demands and employee needs. Torka (2004) found that even nonpermanent workers who would have preferred a permanent relationship (i.e., involuntary temp work) can develop feelings of commitment toward the user firm. This largely depends on

the organization's treatment of temp workers. She advised organizations to minimize differences between permanent and nonpermanent staff on the whole range of HRM practices (e.g., rewards, development opportunities, employee involvement, and work system), thus adopting equal treatment policies and practices.

Outsourcing, Subcontracting, and Offshoring

The ability to breakdown entire business processes into small components, leading to a strong division of labor, has enabled firms to pick and choose the physical location and the type of worker needed for each part of a firm's operations. The emergence of the global economy not only has led to a growth in the number of markets for products and services and the entry of worldwide competition. It has also created more possibilities for moving work and workers across the globe. Multinational firms transfer manufacturing processes to low-wage countries in Latin America, southeast Asia, and eastern Europe. Initially, lowskill, manual work was offshored by companies in Western countries to low-wage countries. Offshoring means moving work to low-cost countries. Probably the most striking examples are the plant closings of American automotive companies in the United States in the 1980s and 1990s and the subsequent opening of new car factories by these same companies in Mexico and other Latin American countries. More recent practices of subcontracting (contracting work out to another firm) of manual labor can be found in the consumer electronics industry. Here so-called original equipment manufacturers (OEM) have subcontracted the manufacturing of different components for a single product (e.g., a computer) to firms in low-wage countries such as Taiwan, China, and Korea. According to K. Purcell and J. Purcell (1998), outsourcing means that an outside contractor takes over the in-house function and manages it on the client company premises (p. 50). For example, some temp agencies offer not only temporary labor but also HRM services for companies such as salary administration or the recruitment and selection of permanent staff. However, K. Purcell and J. Purcell stated that much of the growth in outsourcing is taking place inside the company and often involves employees changing their contract of employment but still working with the original employer. While much of the manufacturing and assembly of components are moved abroad, plenty of this work is done in the country of origin of the OEM. Many computer hardware firms in Silicon Valley rely on local manufacturing firms for the production of their components. The employees in these flexible, low-pay manufacturing jobs are often immigrant workers (see Hossfeld, 1995).

Outsourcing and offshoring are not limited to manual, low-skill labor. Countries such as India have seen substantial employment growth in its IT industry due to the decision of many Western technology firms to outsource software

programming, as well as research and development (R&D) activities. This development, which is becoming more common among European and North American companies, follows a previous trend: the migration in the 1990s of so-called "knowledge workers" from developing countries to, predominantly though not exclusively, IT (-related) firms in the United States. In other words: the beginning of the 21st century is marked by *taking work* (and employment) from one (Western) country to another (developing) country, while the Internet boom of the late 1990s was characterized by *bringing workers* in from one (developing) country to another (Western) country. In the next paragraph, we focus on the external flexibility elite: nonpermanent workers with knowledge and skills rare within and only temporarily desired from the user firm.

EXTERNAL FUNCTIONAL FLEXIBILITY

There is a fine line between external numerical flexibility and external functional flexibility, and sometimes the two may well go hand in hand. External functional flexibility addresses a company's need for a broad *variety* of skills that are not used very often; external numerical flexibility addresses the issue of sheer *volume*.

Why External Functional Flexibility: A Firm and Worker Perspective

The growing use of external functional flexibility can be seen as a response to a company's strategy to reduce its activities to the very core. This often leads to the abandoning of IT, legal, financial, and other more support-type operations. Typically, these high-skill tasks are increasingly carried out by so-called professionals who may move about the labor market as free agents (Pink, 2002) or contractors (Kunda, Barley, & Evans, 2002). The services of these professionals are insourced by firms that, given the move back to core activities, do not want to have these experts permanently on their payroll. However, the employment status of these high-skill professionals varies. They may be employed through an intermediary organization (e.g., a consultancy firm, where they are an employee) and work temporarily at the client firm, or they may choose to work flexibly as a contractor or freelancer, deciding the timing, content, and location of the job for themselves. An individual's decision to become a contractor may be based on a variety of reasons. Income enhancement under tight labor market conditions is a major incentive for workers to go independent (Kunda et al., 2002). The monetary returns of scarce skills held by highly flexible workers are not limited to white-collar professionals. In her study of four Dutch metal companies, Torka (2004) showed that blue-collar workers (welders and fitters) who work for specialized temp agencies earn more than regular staff do. In general, labor market conditions that favor the position of workers typically contribute to making it attractive for employees to move about the labor market in search of the best wage, most challenging job, and most inspiring workplace. This job-hopping is likely to be dependent on a worker's personal situation: school graduates and other newcomers on the labor market in early stages of their life may feel attracted to the perspective of obtaining broad experience by working temporarily in different jobs. The key factor for external functional flexibility is the skill specificity, which typically involves workers with more experience who are not necessarily seeking financial security.

External Functional Flexibility: Consequences for Firms and Workers

One key feature of flexible specialists is that the skill needed by firms is available on call, assuming that labor market conditions are not tight. This means that firms do not have to invest in the skills and that return on skill investment is not a concern. On the other hand, flexible specialists come at a price: Firms pay substantial fees to freelancers and contractors. This is not surprising, given the fact that these flexible specialists often have to pay for their pension, health care, and social insurances. Another concern is that, in order to keep up with market and product developments, contractors have to pay for their own training. Interestingly, much of the relevant skills of flexible specialists stem directly from the fact that they are flexible: They work at different firms and thus acquire a wide array of experience directly related to their craft. A concern for firms relying on particularly high-skilled contractors such as consultants is that these professionals carry with them the skills and knowledge that they acquire on a particular assignment. As Stone (2002) described, this may lead to a dispute over the ownership of human capital: Does the employee own the knowledge obtained from a firm, or is the employee somehow indebted to the firm that enabled him or her to acquire this knowledge? Should workers be limited in applying the knowledge obtained at one workplace elsewhere? While firms do not risk losing training investments, they do run the risk that trade-sensitive information can be used outside of the home company. While this may hurt individual companies, the free circulation of knowledge can boost the competitiveness of an entire economic region such as Silicon Valley (e.g., Saxenian, 1996). On the other hand, in terms of innovation and knowledge creation, the use of flexible specialists, both high skilled and low skilled, may be beneficial even for individual firms. Matusik and Hill (1998) suggested that, in certain environments, flexible work can contribute to accumulating and creating valuable knowledge. Using data from a survey of U.S. firms, Florida (2002) stated that instable networks rather than tight-knit communities are most innovative. Clearly, a firm should prepare for the fact that the company will become part of the experience of the flexible specialist. Firms that want to use flexible specialists should be willing to share the expertise of these contractors with the outside world, even if this means sharing part of the company with the outside world.

CONCLUSION

In this chapter, we presented an overview of one of the most discussed issues in contemporary management: flexible labor. For future managers, an important question has not yet been answered: How can labor flexibility be balanced with other desired outcomes such as quality and innovativeness? This applies in particular to the type of flexibility that has met with the most skepticism: external flexibility and, more specifically, temp agency work. The first part of the following section will be devoted to this subject. In the second part, we will discuss future developments in flexible labor, taking market as well as sociocultural developments into account.

Flexible Champions: Creating Win-Win Situations

How can flexibility be managed in such a way that it really does contribute to organizational success? Firm performance (e.g., financial well-being, improvements in quality and innovation) strongly depends on workers' competences and their willingness to behave in line with the organization's strategic goals. Research shows that satisfaction with HRM policies and practices are strong predictors for working "good and fast," as well as for so-called extrarole behavior, also known as organizational citizenship behavior. Consequently, firms would be wise to meet not only the market requirements but also the workforce requirements. Organizations surely want all workers to give their utmost including temporary staff. As a consequence, firms have to attend to the needs of peripheral workers as well. Moreover, and this is especially true for firms that have to deal with recurring peaks and drops in the business cycle, organizations will want to hire the same competent and reliable temp workers repeatedly, as this will save them the initial prepping periods and the costs related to it. However, the willingness of these temp workers to continue working on an interval basis at the same firm is likely to depend strongly on the treatment they have received in the past.

Companies have to meet the interests of workers, and these interests differ. Not everyone wants to move up the ranks, is looking for challenges in work life, or is looking for continuous improvement of knowledge and skills. Some workers prefer full-time work, while others would like to create a better balance between work-life and private-life interests through working-time flexibility. Many scholars still believe that job security is a universalistic worker need, but this ignores that part of the workforce that has actually chosen to work with changing work locations and footloose

contracts in order to breach routine. And not only highly educated professionals seem to appreciate the advantages of a nonpermanent employer. Thus, as preferences differ, among both the regular staff and the buffering workforce, HRM must provide space for each individual by using an "à la carte" approach: The needs of the company and of all its workers have to be mapped and matched as far as possible. Direct supervisors—those who are responsible for operational HRM—play a major role in realizing this.

Back to the Future: Developments in Flexible Labor

Due to changes in sociocultural environments, at least in Western countries, our contemporary knowledge may well be outdated by tomorrow. Due to international, technological, and sociodemographic developments, employer demands and the labor market change. Concerning the former, new competitors have penetrated the global market. The balance of economic power has shifted to the East, leveling the playing field for countries such as China and India. In addition, Western companies have discovered new low-wage countries in central and eastern Europe such as Bulgaria and Romania (European Union members since January 1, 2007). All of these developments may also turn the (flexible) labor markets upside down worldwide. For highly educated professionals with international ambitions and/or within globally operating companies, the world has gotten bigger. Intercultural and language skills different from those important today are gaining importance. In other words, the competences of these professionals need to undergo a continuous upgrading. The increased offshoring of noncore activities to low-wage countries and rapid technological progress will hit the unskilled and other people with a weak labor market position even harder than it already does today. Millions of jobs will be diminished or emigrated, leaving fewer jobs for the vulnerable in Western societies. However, demographic developments may soften the phenomena associated with the replacement of firm activities.

The changing demography of the labor market is one of the two factors that play a role in determining the type of flexibility applied by firms. The other factor is related to the growing awareness of transaction costs among firms using flexible labor. Given the forecasts regarding the slowing influx of young people into the labor market, firms will increasingly face difficulties attracting and retaining skilled and motivated workers willing to work on a flexible and insecure basis, that is, without the perspective of a permanent contract. This suggests that companies that need to be flexible will have to look for that flexibility, not in the external labor market but rather in the internal labor market. In other words, the flexibility has to be sought and found among the incumbent, core workforce. Following the distinction applied in this chapter, this means that this flexibility can either be realized by making workers more functionally flexible and/or by making them more numerically flexible. Job rotation, combined with worker training, provides workers with the possibility of enhancing their employability, while at the same offering functional flexibility to the firm. Working-time flexibility has the potential to address both the worker's need for a work-life balance and a firm's desire to adjust the volume of working hours inside the company when customer demand fluctuates.

In line with transaction cost theory (Williamson, 1975), firms will benefit from long-term, steady relationships with their employees. Recruiting, screening, selecting, training, and familiarizing workers with the company's business process involve substantial material and immaterial investments. These investments are higher the more a firm relies on external flexibility, that is, on a recurring influx of new, temporary workers. However, in general, companies should realize that labor flexibility is not an independent goal, but a means to achieve other strategic targets such as cost effectiveness, quality, and innovation. As explained previously, there is no sustainable future for Western companies if they attempt to compete on the basis of wage costs, as foreign competitors with a nearly endless reservoir of cheap labor have entered the market. Therefore, reconsideration on and strengthening of quality and innovative capacity needs to take place, even more so when we consider the aging society. In terms of the issue of labor flexibility, this means that the internal maneuverability of workers will regain importance and the temporary insourcing of labor will lose ground. Rather than simply following Peters' (1999) strategy, "innovate or die," we suggest a strategic management style that adds "innovate and flexibilize or die."

REFERENCES AND FURTHER READINGS

Alesina, A., Glaeser, E., & Sacerdote, B. (2005). Work and leisure in the U.S. and Europe: Why so different? (Discussion Paper No. 2068). Cambridge, MA: Harvard Institute of Economic Research.

Atkinson, J. (1984). Manpower strategies for flexible organizations. *Personnel Management*, 16, 28–31.

Atkinson, J. (1985). *Flexibility, uncertainty and manpower management*. Brighton, UK: University of Sussex.

Berkhout, E. E., & van Leeuwen, M. J. (2004). *International data base on employment and adaptable labour (IDEAL)*. Amsterdam: SEO.

Blyton, P., & Morris, J. (1992). HRM and the limits of flexibility. In P. Blyton & P. Turnbull (Eds.), *Reassessing human resource management* (pp. 116–130). London: Sage.

Boltanski, L., & Chiapello, E. (1999). *Le nouvel esprit du capitalisme* [The new spirit of capitalism]. Paris: Gallimard.

Bolwijn, P. T., & Kumpe, T. (1990). Manufacturing in the 1990s—Productivity, flexibility and innovation. *Long Range Planning*, 23, 44–57.

Casey, C., & Alach, P. (2004). "Just a temp?" Women, temporary employment, and lifestyle. Work, Employment and Society, 18, 459–480.

- Finegold, D., Levenson, A., & Van Buren, M. (2003). A temporary route to advancement? The career opportunities for low-skilled workers in temporary employment. In E. Appelbaum, A. Bernardt, & R. J. Murnane (Eds.), *Low-wage America: How employers are reshaping opportunity in the workplace* (pp. 317–367). New York: Russel Sage.
- Florida, R. (2002). The rise of the creative class and how it's transforming work, leisure, community and everyday life. New York: Basic Books.
- Goudswaard, A., Kraan, K. O., & Dhondt, S. (2000). Flexibility in balance: Flexibility and consequences for employers and employees. Hoofddorp, The Netherlands: TNO Arbeid.
- Herzberg, F. (1968, January/February). One more time: How do you motivate employees? *Harvard Business Review*, 52–62.
- Hossfeld, K. J. (1995). Why aren't high-tech workers organized? Lessons in gender, race, and nationality from Silicon Valley. In D. Cornford (Ed.), Working people of California (pp. 405–432). Berkeley: University of California Press.
- Kunda, G., Barley, S., & Evans, J. (2002). Why do contractors contract? The experience of highly skilled technical professionals in a contingent labour market. *Industrial and Labour Relations Review*, 5, 234–261.
- Letourneux, V. (1998). *Precarious employment and working conditions in the European Union*. Dublin, Republic of Ireland: European Foundation for the Improvement of Working and Living Conditions.
- Looise, J. C., van Riemsdijk, M., & de Lange, F. (1998). Company labour flexibility strategies in the Netherlands: An institutional perspective. *Employee Relations*, 20, 461–482.
- Matusik, S. F., & Hill, C. W. L. (1998). The utilization of contingent work, knowledge creation, and competitive advantage. *Academy of Management Review*, 23, 680–697.
- Olsen, K. M., & Kalleberg, A. L. (2004). Non-standard work in two different employment regimes: Norway and the United States. *Work, Employment, and Society, 18*, 321–348.
- Peters, T. (1999). *The circle of innovation*. New York: Vintage Books.
- Pink, D. H. (2002). Free agent nation: The future of working for yourself. New York: Warner.
- Purcell, K., & Purcell, J. (1998). In-sourcing, outsourcing, and the growth of contingent labour as evidence of flexible employment strategies. *The European Journal of Work and Organizational Psychology*, 7, 39–60.

- Rousseau, D. M. (1995). Psychological contracts in organizations: Understanding written and un-written agreements. Newbury Park, CA: Sage.
- Saloniemi, A., Virtanen, P., & Vahtera, J. (2004). The work environment in fixed-term jobs: Are poor psychosocial conditions inevitable? *Work, Employment and Society, 18*, 193–208.
- Saxenian, A. (1996). Beyond boundaries: Open labor markets and learning in Silicon Valley. In M. B. Arthur & D. M. Rousseau (Eds.), *The boundaryless career: A new employment principle for a new organizational era* (pp. 23–39). New York: Oxford University Press.
- Schilfgaarde, P., & Cornelissen, W. J. M. (1988). The flexible firm: Opportunities and instruments for enhancing employee flexibility. Assen, Drenthe, The Netherlands: Management Studies.
- Stone, K. V. W. (2002). Knowledge at work: Disputes over the ownership of human capital in the changing workplace. Connecticut Law Review, 34, 721–763.
- Storrie, D. (2002, March). *Temporary agency work in the European Union* (Consolidated Report). Dublin, Republic of Ireland: European Foundation for the Improvement of Working Life and Living Conditions.
- Thornthwaite, L., & Sheldon, P. (2004). Employee self-rostering for work-family balance. *Employee Relations*, 26(3), 238–254.
- Torka, N. (2004). Atypical employment relationships and commitment: Wishful thinking or HR challenge? *Management Revue*, *3*, 324–343.
- Torka, N., & Schyns, B. (2007). On the transferability of "traditional" satisfaction theory to non-traditional employment relationships: Temp agency work satisfaction. *Employee Relations*, 29, 440–457.
- Van Velzen, M. (2004). Learning on the fly: Worker training in the age of employment flexibility. Amsterdam: Thela Thesis.
- Van Velzen, M. (in press). Roads to flexicurity: Balancing flexibility and security in value-added logistics.
- Volberda, H. W. (1996). Toward the flexible form: How to remain vital in hypercompetitive environments. *Organization Science*, 7, 359–374.
- Williamson, O. E. (1975). *Markets and hierarchies: analysis and antitrust implications—A study in the economics of internal organization*. New York: Free Press.

EMPLOYEE WELLNESS PROGRAMS

ADAM D. BAILEY, HEATHER L. BEMIS-SHIELDS, AND ERIC W. FORD Texas Tech University

n "Prevention Makes Common 'Cents," a report issued in 2003, the U.S. Department of Health and Human Services (HHS) estimated that 129 million adults in the United States are overweight or obese and that treating medical conditions related to obesity costs \$69 billion to \$117 billion per year. HHS also reported that more than 75% of all health-care dollars are spent on chronic conditions such as diabetes, obesity, cardiovascular disease, and asthma-most of which are preventable. In addition, 70% of the cost of health care is incurred by just 5% of the population. Considering that health-care costs are on a steady upward projection—12.5% in 2005 alone—many employers have begun to develop a proactive approach to long-term health-care cost containment through encouraging employee wellness and disease prevention. The target is not those who are already chronically ill, but those who are in an at-risk category. The goal is to provide interventions designed to maintain good health. For those who are successful in these efforts, the benefits are not only realized in lower health-care spending, but also higher employee productivity and enhanced organizational performance. Accordingly, it is important for firms to understand what these programs consist of, how employee wellness programs

create positive business results, and how to implement such programs in their own organizations.

EMPLOYEE HEALTH PROMOTION AS A BUSINESS IMPERATIVE

Employee health and wellness programs attempt to improve the overall health status of employees and sometimes even employees' family members through prevention, education, and health interventions (Johnson & Johnson, 2003). Companies in the United States began to use workplace health and wellness programs in the 1970s, largely in response to declining employee health status and rising health-insurance costs (Conrad, 1987). By 2005, 75% of companies in the United States were offering health promotion programs, up from 56% two years earlier (Pallarito, 2006). Thus, while health and wellness programs at work are a relatively new development, they have rapidly diffused and play an important role in firms' efforts to become more competitive.

So why do organizations care about the health of their employees? This is not a simple question to answer, as

a number of evolving cultural forces have resulted in an increased focus on improving employees' health rather than on merely treating their illnesses. Results from over 22 years of health and wellness interventions, including more than 100 empirical research studies, suggest that these programs provide improved health outcomes and a positive return on investment for business organizations (Pelletier, 2005). Accordingly, these programs have shown to be not only beneficial to employees but also to the employers who utilize them. Health and wellness programs have also been shown to have beneficial effects on organizational financial performance. Wellness programs have been commonly attributed with being "at least partly responsible for slowing the increase in health insurance premiums" (Kossek, Ozeki, & Kosier, 2001, p. 25). In addition, they have been shown to reduce absenteeism and increase employee productivity (Eddy, Eynon, Nagy, & Paradossi, 1990). For example, city employees in Garland, Texas, took part in a half-year health and wellness program in which they collectively lost around 800 pounds, leading to an annual health-care cost reduction for the city of around \$700 per employee (American City & County, 2005). This savings results in a reduced burden on taxpayers as well as increased services provided by the city to better meet its citizens' needs.

Health and wellness programs may become increasingly important in the future due to the competitive nature of the global marketplace. In an intense market for human capital, any advantage enhances firm competitiveness. The extent to which health and wellness programs can improve employee morale and company image creates an edge in employee retention (Conrad, 1987). Higher morale and improved reputation can serve to not only make existing employees more productive but also to make it easier to attract quality employees in the future. For example, providing employees with a corporate gym is not uncommon, and this practice can be viewed as a tool for not only improving employee fitness levels, but also employee recruitment (Fickensher, 2004). Access to a corporate gym is a recruiting "perk" that is attractive to potential employees, particularly those with a busy family life or a long commute. As work and home environments have become less physically demanding, the overall fitness level of the population has declined (Paton, 2005). In the past, when work environments were more physically demanding, work itself often provided health benefits. Many modern occupations tend not to be physically strenuous, thus supplemental exercise is becoming necessary if employees are to maintain their health.

Other factors such as urbanization, automation, and an abundance of relatively inexpensive food have added to the overall phenomenon of poor physical health in the United States. From an employer's perspective, the increasing average age of workforce participants magnifies the negative effects of these changes, as health and physical fitness tend to decline with age. These societal and demographic changes have led to increases in diseases such as cancer, cardiovascular illnesses, and diabetes. These conditions

are not only disabling to employees, but can also be very expensive to employers in the forms of lost productivity and insurance expense. Insurance benefits are an important set of issues for U.S. firms, as they often pay a significant portion of the health-care costs of their employees. Accordingly, increasing and potentially avoidable health-care costs have resulted from employee illnesses associated with these societal trends. From an employer's perspective, the costs include increasing insurance premiums, loss of employee time due to illness, and decreased productivity (Johnson & Johnson, 2003). Organizations with higher utilization rates are subjected to increased insurance premiums. Employee illness is costly to employers as it results in employees not performing their jobs effectively due to not "feeling 100%" while on the job, which diminishes productivity or even causes employees to stay home from work, which means they are completely unproductive. Taken together, these additional costs can eat away at the profit margins of business organizations. Every dollar spent for employee health care is one dollar less that can be spent on servicing customers, investing in research and development (R&D), or returned to investors as profit. Thus, it is important for companies to take into account not only the direct costs, but also the indirect costs of decreased productivity and the opportunity costs of poor employee health.

The escalation of workforce-related health expenses has created strong incentives for organizations to manage this aspect of their business more actively or have their financial performance threatened. From this perspective, developing and successfully implementing employee health and wellness programs becomes vitally important for firms seeking to become more competitive through effective human resources development. An effective and loyal workforce is an organizational feature that is unique to a firm and creates a strategic capability that is difficult to imitate.

Health and wellness programs seek to build a sustainable human resource by mitigating the costs of employee illnesses related to preventable causes. This focus on preventable causes is important because it indicates to employees that their employers are taking a proactive approach to creating a healthy work environment. Health-care costs are far from trivial for modern firms. These costs are second only to wages in the total compensation package and are thus a significant concern for many organizations—particularly those with aging workforces that have guaranteed benefit structures such as the auto industry (Fottler et al., 1999). For example, DaimlerChrysler Corporation has over 95,000 employees throughout the United States. In 1985, it instituted a national wellness program as a negotiated benefit between the company and the United Auto Workers Union (UAW). By 1995, the program resulted in savings of over \$1.5 million dollars per month (Fottler et al., 1999). In the capital-intensive auto industry, significantly reducing the overall cost structure by that amount creates a sustained competitive advantage. For most organizations, it is enough of an incentive to invest in the health of their employees.

A CHANGE IN MIND-SET: ILLNESS PREVENTION TO WELLNESS PROMOTION

Wellness programs are the result of companies realizing that it may be cost efficient to focus on keeping employees healthy rather than paying for the costs of treating the outcomes of poor health (Pelletier, Klehr, & McPhee, 1988). The wellness movement is a significant advancement in employer/employee relations, as it may enable health care to be viewed from an entirely new perspective. Thus, the health and wellness movement involves a major paradigm shift from focusing on alleviating or reducing work-related illness to helping employees maintain and improve their health status, with a special emphasis on facilitating positive behavioral changes. Positive behavioral changes may set in motion a "virtuous spiral" that is beneficial to both employees and employers. Rather than looking at health care as simply a cost to be minimized, it can be seen as an important human resources investment that enables employees to be more productive. In doing so, health care is transformed from being viewed as an organizational constraint to being viewed as a potential competitive advantage in the form of facilitating a superior workforce. Firms with healthier employees are likely to be more productive, efficient, and successful. Thus, health and wellness programs can be seen as complementary to other strategic human resource approaches that are concerned with maximizing human capital for long-term competitive advantage.

Whereas traditional health-care approaches may have focused solely on those experiencing illness, health and wellness programs are for everyone in an organization, even those who are relatively healthy. Accordingly, due to the sheer number of people who participate, they offer significantly more potential to be beneficial to firms than programs focused primarily only on those who may have poor health. Research has shown that employees with poor health have lower work performance than those with good health, and this difference is equivalent to working one full day less in a workweek (Paton, 2005). Over the course of a year, this research suggests that a firm with healthy employees would gain an additional 2 months of productive efforts from its employees. In addition, "presenteeism" is reduced—employees who come to work but get less done due to chronic but not controlled diseases or health behaviors and risks (Burton et al., 2004). Thus, employee health has a tremendous impact on productivity. Empirical research also indicates that employee participation in health activities may lessen the occurrence of undesirable outcomes related to poor physical health such as heart disease (Eddy et al., 1990). As an example of how costly poor health choices by employees can be for organizations, a recent U.S. Air Force (USAF) study illustrates the magnitude of the costs associated with employee tobacco use. The USAF estimates it loses around \$107 million annually due to the impacts of employee smoking (Robbins, Chao, Coil, & Fonseca, 2000). Thus, a proactive stance on employee health would likely reduce the use of tobacco, improve overall employee health practices, and provide early intervention for chronic illnesses and diseases. This simple example serves to illustrate the potential power and value of taking a health and wellness approach in regards to employee health. When compared with the traditional disease management approach to health care, "the health and wellness approach seeks to address the root causes of chronic conditions and explores avenues such as lifestyle changes, habits, and environment to help people avoid developing those conditions" (Oort, 2005, p. 7).

Health and wellness programs also seek to lower costs by decreasing demand for clinical medical services that are paid for through the company's insurance plan (Kossek, Ozeki, & Kosier, 2001). This demand reduction approach is innovative in that it views the solution to poor employee health as being improved behaviors by employees, as opposed to passively hoping for technological breakthroughs that will cure the health problems faced by employees. The focus is on enabling positive behavioral change rather than on facilitating technological advancement as the primary solution for rising health-care costs. This health and wellness approach views the answer to escalating health-care costs in improved employee lifestyle choices and behaviors rather than improved technology.

TYPES OF EMPLOYEE WELLNESS PROGRAMS

Employee health and wellness initiatives range from simple health-risk appraisals to complete on-site services. A recent study by the Society for Human Resource Management (Weatherly, 2005) found the following to be the most commonly cited components of organizational wellness programs:

- Reducing insurance premiums for those who participate in health screenings
- Reducing insurance premiums for nonsmokers
- Waiving and/or reducing deductibles and copays for preventive care
- Providing on-site fitness facilities or discounts to area fitness clubs
- Sponsoring weight-management programs
- Conducting workshops on health and wellness (e.g., smoking cessation)
- Sponsoring on-site health fairs with free laboratory testing/health screening
- Providing flu shots
- Paying for or subsidizing on-site massages
- Supporting corporate fitness clubs (walking, biking, hiking, etc.)

Health-risk appraisals may include a wide variety of tests that seek to determine the current health status of employees.

These screenings provide information to both employees and employers that may enable positive behavioral changes, which enables employees to understand their current level of health and to develop a plan for improvement. This is important because some employees may not realize they are at risk until their health is assessed (Oort, 2005). Some highly debilitating and costly health problems such as diabetes, heart disease, and obesity may not even produce symptoms that are recognizable as warning signs until the conditions are significantly advanced. These screening tests are generally low cost and simple to administer. At the other end of the cost-continuum, some organizations have instituted on-site medical clinics to provide employees with easy access to medical care. This can be important for employees who may have very little time outside of work and thus may neglect their health or fail to seek necessary medical advice without easy access to these services at work. Other organizations may provide on-site fitness centers to make it possible for employees to exercise before or after work or even during the work day. The convenience of these fitness centers may provide an incentive for employees to exercise who would not otherwise do so because of lack of time or desire to go to a fitness center requiring a separate trip. In the middle of the continuum are programs that offer cash incentives for participation in healthy activities, medical coverage discounts contingent on good health assessments, smoking cessation programs, and health-club membership reimbursements. These programs are effective in improving employee health, as they provide additional incentives or make participation in healthy activities more convenient. These programs are more than just good intentions. Health and wellness programs have been attributed to both improving employee health and decreasing the costs of providing health care for employees.

One example of a successful health and wellness program is Maple Grove, Minnesota, which provides cash incentives for employees to participate in activities that can improve their health and reduce the likelihood of their incurring health-care costs (Sweeney, 2001). In this program, employees can be rewarded for participating in a variety of programs such as health assessments or weight-loss meetings. These cash incentives are utilized to motivate employees and have been successful, as health-care costs per employee are decreasing and have ranked below the average nationally since 1998. Further, greater wellness among the city employees has produced numerous benefits. It has led to a less stressful work environment, improved retention, increased productivity, and below-average health-insurance inflation.

Effective wellness programs are mutually beneficial for both employers and employees. Employees benefit from improved quality of life and employers benefit from improved organizational performance. Thus, health and wellness programs have the potential to be highly beneficial as they facilitate the undertaking of immediate behavior changes that will in turn provide numerous long-term benefits.

KEYS FOR SUCCESSFUL IMPLEMENTATION OF HEALTH AND WELLNESS PROGRAMS

The most significant factor in the success of an employee wellness program is leadership buy-in demonstrating support and enthusiasm for the initiative. Wellness must be integrated into a company's strategic plan, articulating a vision for employee well-being. Employees must see the top-level leaders involved in wellness efforts before they will engage in the programs; otherwise these programs will be viewed as a "flavor-of-the-month," short-lived management fad. Successful employee wellness programs share the following hallmarks: They begin with health-risk assessments, offer a number of employee incentives, and track measurable results in turnover, absenteeism, claims data, and insurance costs over a multiyear period.

Implementing a health-risk assessment is an important first step in creating an employee-wellness initiative, as employees who are most at risk for disease or illness are often unaware of their risk factors. To the degree that health-risk assessments are able to improve the detection of chronic disease markers, they are likely to provide important motivation to employees to make efforts to change their behaviors and improve their health. In addition, health-risk assessments enable companies to gather anonymous information about employee health and create programs to lessen the probabilities of undesired outcomes (Fickensher, 2004). They can enable firms to gain a clearer picture of the nascent health conditions of their employees and thus make it possible for them to intervene before health problems become severe. This aggregated baseline information is important for measuring overall outcomes of wellness programs through insurance claims information and experience rates.

Incentives greatly increase participation in wellness programs among employees who have the greatest risks of health problems (Oort, 2005). Incentives that may work well and improve the likelihood that health and wellness programs will be successful include cash or decreased costs of health care. For example, one incentive-based wellness program "offered insurance premium reductions or increases in copayments, and coupons to apply to flexible benefits based on annual evaluations of health and fitness by medical staff, wellness classes, access to fitness facilities, and assistance with weight loss and smoking cessation" (Kossek, Ozeki, & Kosier, 2001, p. 24). Companies such as Coors Brewing Company and Dell provide health-care premium discounts to employees who participate in wellness program activities (McQueen, 2006). Utilizing a variety of incentives is important in order to appeal to a diverse group of employees. For example, some employees may be highly motivated to reduce their health-care costs. For others this may not be important, but they may be motivated by having easier access to exercise facilities or the opportunity to join a company-sponsored hiking club. Whatever the method, creating a culture of health through a number of employee wellness activities is critical to employee adoption of healthy lifestyle choices.

Calculating the return on investment of wellness programs through measurable outcomes is a critical factor in assessing the success of the initiative. As previously mentioned, common measures include turnover, absenteeism, and reduction in health-insurance premiums or claims. However, quantifying wellness return on investment is a challenge because the savings happen over a multiyear period and often cannot be measured in the same straightforward manner as actual expenses. Thus, it may be difficult for health and wellness programs to show a positive return on investment (Paton, 2005). The actual financial benefits of these programs may take time to materialize, as improved health is not immediate but takes constant, prolonged effort. A short-term focus can hinder the utilization of and success

Table 60.1 Employee Wellness Programs Return on Investment Factors Company Employee Wellness Initiatives Outcomes Motorola Invests \$6MM in wellness For every \$1 invested in wellness, \$3.93 saved. annually \$6.5MM annual healthcare Disease management Health screenings savings. Smoking cessation & weight loss programs Health fairs On-site & external wellness centers Union Pacific Vision is to be the healthiest 10% decrease in health care Railroad company in U.S. costs during 2001, equal Butt out and breathe smoking to \$53.6 million. Smoking prevalence dropped from cessation program 500 contracted fitness 40% to 28%. facilities Incentive program tied to compensation On-site occupational health nurses Caterpillar Low-cost health assessments Predicts long term savings of \$700MM by 2015. Those Individualized interventions Intensive high-risk population who completed high risk case management program reduced doctor visits by 17% and hospital Internet and telephone information centers days by 28%. On-site classes Full-time wellness manager Total cost savings of \$1.1MM Lincoln in 2004. One of the nation's Plating Tobacco-free campus with no smoke breaks most recognized models for 14,000-ft. mountain climb wellness. challenge Annual wellness performance objectives Free, comprehensive health assessments

of longer term programs (Eddy et al., 1990). Intangible benefits such as employee morale, recruitment enhancement, or increased retention of employees must also be considered in the return on investment equation. Examples of the wide variety of positive outcomes possible with a successful wellness program are illustrated in Table 60.1.

CHALLENGES FOR THE IMPLEMENTATION OF WELLNESS PROGRAMS

Three major factors make the implementation of health and wellness programs problematic: employee attitudes, calculation of return on investment, and legal requirements. Like any other programs that require significant behavior changes, the possibility of long-term rewards may be in-

sufficient to change unproductive behaviors and overcome the inertia of bad habits that may be widely accepted and difficult to overcome. Implementation challenges include employee disinclination to get involved and the difficulty of quantifying the cost savings that result from improved employee health (Oort, 2005). These programs may require infringing on employees' lifestyles in order for them to take the steps necessary to achieve improved health (Paton, 2005). Employees may be defensive to external efforts to change them and may exert their freedom to act as they choose, even if it is detrimental to them or the organization. They may believe that the organization is "heavy-handed" or "paternalistic" in its efforts to improve employee health. Many studies have focused specifically on the return on investment from worksite health promotion and disease-prevention programs. One recent review identified well-conducted, rigorous evaluation studies of return on investment, then documented the range of return on investment estimates in these studies, and examined the factors that influenced program outcomes and return on investment estimates (Goetzel, Juday, & Ozminkowski, 1999). Findings on the return on investment for health promotion and disease management programs were reported for nine employers: Canada & North America Life; Chevron; City of Mesa, AZ; General Mills; General Motors; Johnson & Johnson; Pacific Bell; Procter & Gamble; and Tenneco. These programs provide health education to their employees to promote behaviors that will improve health or prevent disease, and typically include exercise programs, health-risk appraisal, weight control, nutrition information, stress management, disease screening, and smoking cessation. The review

found significant return on investment for the programs provided by these nine employers, with the range of benefit-to-cost ratios, ranging from \$1.49 to \$4.91 in benefits per dollar spent on the program and a median of \$3.14. For instance, at the high end, General Motors realized at one of their sites an annual savings of \$105.50 in total health-care costs per enrollee for an annual program costing \$27 per enrollee—a ratio of 4.91 to 1 (benefits to costs). These outcomes demonstrate that improving employee health is a long-term commitment and probably will not improve the performance of the overall organization significantly before the next quarterly reports.

A third and final challenge to the implementation of wellness programs is the burden of legal reporting requirements and privacy statutes. Employers seeking to establish wellness programs in connection with an employer-sponsored group health-benefits plan need to take into account certain requirements under ERISA, the Internal Revenue Code, and the Public Health Service Act (PHSA). All three laws were amended by the Health Insurance Portability and Accountability Act of 1996 (HIPAA) to provide for improved portability and continuity of health coverage. HIPAA also added Code section 9802, ERISA section 702, and PHSA section 2702, each of which prohibits discrimination in health coverage based on health status. These nondiscrimination provisions, however, do not prevent a group health plan or health-insurance issuer from establishing discounts or rebates or modifying otherwise applicable copayments or deductibles in return for adherence to programs of health promotion and disease prevention (Alvarez & Soltis, 2006). To qualify, programs must generally be open to all employees, be limited in their reward amounts, and provide a reasonable alternative standard for employees who are unable to participate for medical reasons (such as maintaining a cholesterol count below 200 or losing 10% of one's total body weight). HIPAA further dictates the privacy standards that health-care providers (and employers) must adhere to when communicating with employees about their protected health information (PHI). The National Labor Relations Act (NLRA) requires a unionized employer to bargain with the union regarding wages, hours, and other terms and conditions of employment—so-called mandatory subjects of bargaining. Failure to do so constitutes an unfair labor practice under the statute. The National Labor Relations Board would likely find that participation in a wellness program—even if voluntary—is a term and condition of employment, especially if the program includes financial incentives. Finally, wellness programs must comply with the Americans with Disabilities Act (ADA), particularly in regards to making reasonable accommodations for disabled employees. Overall, employers are advised to take the following steps to minimize the likelihood of legal challenges to their wellness initiatives:

 State the positive purposes for the program, and consider whether these purposes may be achieved without medical inquiries.

- Avoid a coercive tone, and emphasize voluntary participation.
- Frame incentives as rewards, not penalties.
- Provide accommodations for individuals with disabilities to enable them to participate in the wellness program.
- Retain a third party to manage medical information.
- Comply with applicable state lifestyle or disability discrimination laws.
- Raise awareness about inappropriate remarks about lifestyle. Jokes and nicknames are fodder for harassment and discrimination litigation.
- Bargain with the union to extend the program to represented employees.

Health and wellness programs have been critiqued for a number of reasons. For instance, some point out that much of the health-care costs borne by employers are attributable to the family members of employees rather than the employees themselves (Conrad, 1987). According to this reasoning, health and wellness programs at work would be of little benefit because the employee's family members are not able to utilize these programs. Moreover, no amount of physical fitness may be able to compensate for poor mental health among employees. Poor employee mental health may necessitate other interventions far different from those utilized in health and wellness programs. However, these criticisms are not entirely justified. To the degree that health and wellness programs apply to and are utilized by family members of employees as well as employees, and to the degree to which improved physical fitness also is associated with improved mental health either directly or by enabling people to better cope with stress, these criticisms are largely unfounded. Another criticism of health and wellness programs is that some view these programs as controlling, as they may require employees to participate in a health-risk assessment in order to qualify for insurance coverage (Mc-Queen, 2006). However, while this may be true to a certain extent, it would be unreasonable to think that employees should benefit without any costs. Making positive behavioral changes is not easy, but it appears that these changes are indeed worth the effort. Empirical research has demonstrated that employee wellness programs are beneficial to both employees and employers. Accordingly, for firms to be productive and competitive, we posit that it is important for them to understand the potential value of health and wellness programs. Further, it is important for them to understand how they can best overcome the challenges and resistances that these programs face, and how these can be overcome, so that they can be successfully implemented.

SUMMARY

As the cost of health care continues to escalate, many employers are choosing a proactive approach to long-term cost containment by encouraging employee wellness and disease prevention. Poor employee health is associated with increasing costs to employers due to increased health-care and insurance costs, lost employee productivity, and the opportunity costs associated with lost investments in value creating activities such as R&D. Societal trends such as sedentary working conditions, an aging workforce, easy access to abundant amounts of unhealthy foods, and technological conveniences have made it more difficult for employees to maintain good physical health. Thus, employers are often challenged with finding ways to induce their employees to pursue healthy life choices, thereby preventing many of the chronic diseases that plague so many Americans today.

Employee wellness programs are now found in 75% of major organizations. These programs have been shown to not only improve employee health but also to improve organizational performance and lessen the negative effects of undesirable social trends of diminishing physical health. It is anticipated that the utilization of health and wellness programs at work will continue to increase, becoming even more important for organizations as employees become more health conscious, and employers look for new ways to reduce insurance costs, worker absenteeism, and improve productivity. While improved employee health will not completely counteract the annual increases in healthcare expenses, a number of studies have demonstrated per employee savings of up to \$800 per year. Further, through enhanced productivity and decreased presenteeism, investments that lead to healthy employees are also beneficial for organizational success. This will be especially true in a global economy where competitive advantage is fleeting and pressures to become more efficient and effective are present. Overall, employee health and wellness programs are viewed as an important human resources innovation that provides benefits to employers, employees, and society in the form of improved health, enhanced organizational performance, and reduced health-care costs.

REFERENCES AND FURTHER READINGS

- Alvarez, F. P., & Soltis, M. J. (2006). Preventive Medicine. *HR Magazine*, 51(1), 105–109.
- American City & County. (2005). Benefits of good health. *American City & County*, 120(13), 43.
- Burton, W. N., Pransky, G., Conti, D. J., Chen, C. Y., & Edington, D. W. (2004). The association of medical conditions and presenteeism. *Journal of Occupational & Environmental Medicine*, 46(6), S38–S45.
- Conrad, P. (1987). Wellness in the work place: Potentials and pitfalls of work-site health promotion. *The Milbank Quarterly*, 65(2), 255–275.
- Eddy, J. M., Eynon, D., Nagy, S., & Paradossi, P. J. (1990). Impact of a physical fitness program in a blue-collar workforce. *Health Values*, *14*(6), 14–23.

- Employee benefit plan review. (1998). Hewitt surveys trends in wellness program, 52(11), 46.
- Fickensher, L. (2004). Employers finding corporate gyms work out well. *Business Insurance*, *38*(10), 16.
- Fottler, M. D., Johnson, R. A., McGlowan, K. J., & Ford, E. W. (1999). Attitudes of organized labor officials toward health care issues: An exploratory survey of Alabama labor officials. *Health Care Management Review*, 24(2), 71–82.
- Goetzel R. Z., Juday, T. R., & Ozminkowski, R. J. (1999). What's the ROI? A systematic review of return-on-investment studies of corporate health and productivity management initiatives. *AWHP's Worksite Health*, 6(3), 12–21.
- Johnson, R. E., & Johnson, P. G. (2003). Are H & P programs for you? *Strategic Finance*, 85(6), 1–6.
- Kossek, E. E., Ozeki, C., & Kosier, D. W. (2001). Wellness incentives: Lessons learned about organizational change. *Human Resource Planning*, 24(4), 24–35.
- McQueen, P. P. (2006). The road to wellness is starting at the office. *The Wall Street Journal*, pp. D1, D3.
- Oort, G. V. (2005). Health and wellness: Important factors in curing an ailing care system. *Employee Benefit Plan Review*, 60(2), 7–9.
- Pallarito, K. (2006, October). U.S. companies embrace 'wellness' programs. Retrieved September 12, 2007, from http://www. healthfinder.gov/news/printnewsstory.asp?docID=535337
- Paton, N. (2005, October 25). The health of nations; A healthy workforce is a sound investment that will pay dividends in the future, says Nic Paton. *Personnel Today*, p. 30.
- Pelletier, K. R. (2005). International collaboration in health promotion and disease management: Implications of U.S. health promotion efforts on Japan's health care system. *American Journal of Health Promotion*, 19(Suppl. 3), 216–229.
- Pelletier, K. R., Klehr, N. L., & McPhee, S. J. (1988). Developing workplace health promotion programs through university and corporate collaboration: A review of the Corporate Health Promotion Research Program. American Journal of Health Promotion, 2(4), 75–81.
- Robbins, A. S., Chao, S. Y., Coil., G. A., & Fonseca, V. P. (2000). Costs of smoking among active duty US Air Force personnel—United States, 1997. Morbidity and Mortality Weekly Report, 49 (MM20), 441–445.
- Stover, T. L. (2004). Wellness. In M. J. Stahl (Ed.), *Encyclope-dia of health care management*. Thousand Oaks, CA: Sage Publications.
- Sweeney, K. (2001, September 15). VSP "people first" winner: Innovative wellness program reaps rewards. *Employee Benefit News*, *15*(12), 27–28.
- U.S. Department of Health and Human Services. (2003). *Prevention makes common "cents.*" Retrieved September 12, 2007, from www.healthproject.us/documents/Centscondensed.pdf
- Weatherly, L. A. (2005). Making a case for employer-sponsored wellness programs. SHRM voluntary benefits series part III: Employer sponsored wellness programs. Retrieved September 12, 2007, from http://www.shrm.org/research/briefly_published/

Career Management

KERR INKSON

University of Waikato, New Zealand

in the developed countries, we have moved a long way beyond times past when most people had "employment" or "jobs" rather than careers. A career is often defined as "the evolving sequence of a person's work experiences over time" (Arthur, Hall, & Lawrence, 1989, p. 8). The term evolving sequence tells us that a career is more than just a string of jobs: These jobs are linked together over time and patterned so that we can see a career as a single meaningful entity, for example, "a career in banking," "getting to the top of the organization," or "from hairdresser to salon owner." Careers are cumulative in that experience, skills, and interests developed in one job can be carried over into the next. While not everyone who works is a manager, everyone who works has a career, and for most people, it lasts for many years. This makes careers a very personal and important topic for just about everybody.

Arguably, for most of us, the management of our careers is the most important management there is. When we join organizations and contribute to them, we do so with our own welfare in mind. Of course, we are also interested in organizational matters; we ask questions about the organization: What does this organization do? What are its values and culture? Where is it going, in the long term? But these questions are asked from a personal perspective: Does the organization do something that suits *me*? Are its values in line with *mine*? In the long term, where will this organization take *me*? In many cases, we willingly identify with the organization's objectives, mission, and way of doing things, but this is less because we value these intrinsically than because we know that cooperating with the organi-

zation will enable us to pay our own bills, meet our own values and needs, and provide for our current lifestyle and development into the future. In short, we join organizations and often commit to them for future-oriented personal reasons—reasons that are connected to our *careers*.

It follows that career management is an important facet of management in general. If individuals are to become and to remain committed to organizational objectives and to effective completion of their work tasks, they have to gain not just immediate rewards but ongoing personal benefits for their careers in doing so. If careers are not managed or are managed badly, they, like organizations, can become aimless, disorganized, and dysfunctional.

Another key aspect of career management relates to whether the career is regarded as an individual activity or as part of a collective activity. In some cultures and in some families, careers are seen as an expression of collective will and advantage. Individuals may be expected to cede their control over their careers to wider and more important forces. This was true in some of the former communist and other totalitarian societies where the state controlled important aspects of many careers. It is also true in societies that have a strong emphasis on collectivism rather than on individualism and where family businesses or traditions determine careers. In contrast, in the United States, a career is typically regarded as a major individual project or series of projects: The person is very much in charge, and in the end, while he or she may seek support and guidance, he or she must take personal responsibility for the career. In this chapter, this second approach is assumed as the main focus.

CAREER MANAGEMENT: ORGANIZATIONAL OR INDIVIDUAL?

In the organizations that you join, you will seldom find a career management department. Rather, it may be assumed that if the organization in general is managed effectively, employees' careers will look after themselves. For example, if the organization is successful in developing itself, it will most likely grow in size and, thereby, will provide expanding career opportunities for its members. The human resource management (HRM) area, which involves policy and practice in recruitment, staff selection, employee training and development, performance evaluation, promotions, and planning for future staffing, is key to providing an organization in which people are able to maximize their career opportunities. Many HRM textbooks have chapters on career management viewed as an organizational function on behalf of the organization's members.

But individuals have an important role to play in the management of their own careers. For a person's career to work, it is not enough for that person to respond passively to whatever career development the organization seeks to offer or impose. He or she should indulge in career planning and should be proactive in thinking strategically about his or her future, setting personal goals, making effective decisions about career moves, and seeking new opportunities for learning and advancement. Thus, career management has two distinct meanings: the individual's management of his or her own career and the organization's management of all its employees' careers. An employee's personal career management is often done in partnership with the organization as a joint manager of the career. Managers themselves have to manage their own careers while simultaneously contributing to the management of the careers of their subordinates.

Career management using either meaning encompasses a range of techniques for imposing order on what might otherwise be a series of disconnected noncumulative employment experiences. Career management seeks to utilize management ideas such as strategy, planning, goal setting, rational decision making, assessment, feedback, personal development, and control to maximize the individual's long-term fulfillment of his or her potential and of his or her long-term contribution to the organizations in which he or she works. But career management can be practiced by individuals and their organizations either separately or collaboratively. It will succeed best for both parties when this collaboration is strong, and each party appreciates what the other is trying to do.

Debate has arisen in recent years as to the respective roles of organization and individual in managing the individual and as to which one has the strongest influence. One formulation contrasts career self-management (CSM) with organizational career management (OCM) and notes that, while these may be regarded as competing interests battling for the control of a person's career, it is possible for the individual and the organization, respectively, to practice them collaboratively so that both parties benefit (Sturges, Guest, Conway, & Mackenzie Davey, 2002). For example, a company accountant, bored with figures, might seek to direct her career more into marketing; her employing organization might recognize both her aspirations and her potential and might offer her a suitable job move within the company.

THEORY AND APPLICATIONS 1: THE CONTEXT OF CAREERS

Like all management, career management is occasionally assisted and often constrained by contextual forces that are broader and stronger than individual careerists and the organizations that employ them are. People cannot always go exactly where they want in their careers. Careerists have been likened to travelers moving across a landscape (Inkson & Elkin, in press). Like travelers, they must plan and traverse their routes taking due account of the topography—for example, the hills, mountains, and rivers to be crossed and the paths available. There may be severe constraints, and the topography may change unexpectedly.

First, forces such as economic development, technological change, and new public tastes both constitute and change the landscape as the traveler proceeds. The careerist must pay attention. Decisions taken by career beginners now may have consequences for them in 40 years. Occupations, organizations, and even industries that seem attractive now may cease to exist or may change beyond recognition. Current trends that are relevant are the move toward temporary and part-time forms of work, to contracting rather than employment, the continuing emancipation of women in the workplace, the continuing restructuring of work due to information technology, the aging of societies, the increasing gap between the "haves" and "have-nots," and the rise of the creative industries (Inkson & Elkin, in press). These trends change the labor market and career development must fit in with what the market wants: There are many more wannabe dress designers, rock stars, and astronauts out there than their respective markets can absorb.

Second, factors such as social class, gender, ethnicity, and education often determine whether people can reach their career aspirations or even what aspirations they develop in the first place (Johnson & Mortimer, 2002). If you are poor, Black, female, and uneducated, you may not even think of the possibility of eventually becoming the CEO of a large corporation, let alone trying to do it: If you do try, there are many barriers to stop you from succeeding. But if you are from a well-off family, White, male, and Harvard educated, it will not be surprising if you have both the aspiration to "get to the top" and a reasonable chance of doing it one day. This does not necessarily mean that the less privileged should give up on their dreams, but they will

have to find ways to manage and overcome the barriers to their aspirations, as well as the aspirations themselves.

Third, organizations are themselves part of the context. They have important structural features that influence careers. In one sense, organizations can be representations of features of the wider society. For example, an organization may embody societal biases against minorities or against women and may express these, possibly unconsciously, in its personnel selection and advancement decisions. But organization structures also have an influence. The jobs that are the building blocks of careers are linked in structures that provide career pathways. After serving as a management trainee, you may move up the hierarchy to become a first line manager. Next, you may volunteer for an assignment to another department or overseas, and then you may apply for promotion. Here, you are dependent on the structures and job opportunities created by the organization. A restructuring of your organization may have the collateral effect of restructuring your career. The ways in which organizations manage the careers of their members are spelled out in the second half of this chapter. If you want to manage your career, you must manage aspects of the organization or organizations in which your career is enacted.

THEORY AND APPLICATIONS 2: CAREER SELF-MANAGEMENT

CSM—sometimes called career development—includes personal career planning and decision making. The career development movement, whose theories are summarized periodically by Brown and Associates (2002), focuses on individual psychology and decision making. A person's choices (e.g., choice of school subjects, of university degree, and of first job or occupation) have strong influences on his or her subsequent career, yet are often made at a relatively young age without much to support them by way of information or logic. The founder of the career development movement, Parsons (1909) believed that individuals should maximize their knowledge of their skills and interests, maximize their knowledge of the world of work and the alternatives open to them, and use what he called "true reasoning" (rational decision making) to find the match between the two. Nearly 100 years later, that is still the rationale for much career theory and guidance.

Career Decision Making and "Fit"

One way of thinking about careers—a way popular with the career development movement—is as a sequence of *decisions*: for example, which program of study to undertake, which occupation to choose, which organization to work for, what kind of job to seek, and which offer to accept. Career theorists suggest that a person will increase both career success and career satisfaction by making "congruent" choices, that is, choices where there is a good fit between

the person and the work. Because careers are so central in their lives, people should maximize the information they have available to them both about themselves, about the opportunities available to them, and about using rational analysis and thought to find an effective match between the two. There are many schema, assessment devices, and how-to-do-it books to assist good career decision making, as well as professional agencies such as the National Career Development Association (NCDA; see http://www.ncda. org) and qualified career counselors, often employed by colleges and universities.

An individual seeking a good fit will seek to gather information about both him- or herself (e.g., abilities, interests, values, personality, educational qualifications) and about the world of work (e.g., occupations, industries, organizations, and future opportunities) with a view to making effective rational matches between the two, for example, in choosing a job, an occupation, and an employer.

Career development theorists have gathered a lot of information and have formulated some important theories about how individuals make career decisions. Many of these theories are summarized by Brown and Associates (2002). For example, social cognitive career theory propounded by Lent and his colleagues focuses occupational choice and in particular the influence of self-efficacy (a person's belief in their own abilities to carry out specific actions) and outcome expectations (their evaluation of the likely outcomes of a particular course of action) as determinants of occupational interests and ultimately career choices. The career information-processing model of Reardon, Lenz, Sampson and Peterson (2006) identifies different decision-making levels and skills that individuals apply to the information available to them about their career options. Work adjustment theory put forward by Dawis and Lofquist (Dawis, 2002), in contrast, emphasizes the way in which people's abilities and values are congruent or incongruent with the requirements of and reinforcements for the career choices they make, causing them to move on in their career when the fit is poor.

One of the most influential approaches is that of Holland (1997) who developed "vocational personality theory." Holland asserted that a key factor in career choice and adjustment is people's individual vocational interests and the fit between these and the occupations available to them in the world of work. By completing Holland's self-directed search questionnaire (Psychological Assessment Resources, 2001), individuals can have themselves assessed in six specified areas of interest—realistic, investigative, artistic, social, enterprising, and conventional. By considering his or her three strongest areas and their order of magnitude, a person can then match their pattern of interests against the various occupations available, each of which has its own profile in terms of which of the six interests fit it best. The key to managing one's career according to this approach is to make choices that are congruent with one's intrinsic interests. Over many years, Holland (1997) has assembled a great deal of data in support of his theory, though with mixed results in terms of validity (Spokane, Meir, & Catalano, 2000).

Because careers last a lifetime, finding the right fit is an ongoing process. People and the jobs, occupations, and organizations they work in change constantly—the landscape change referred to earlier. Individuals' personal circumstances may change—they may get married, have children, or move to a new town; their skills may change as they learn new ones through work experience or outside activities; their motivation may change as they mature or develop new interests. At the same time, organizations also change; for example, they grow or contract, reorganize their structures, or introduce new technology. This changes the jobs that people have and work that they do. For example, in recent years automation has reduced the number of manual jobs, especially unskilled and semiskilled jobs, creating major career problems for those whose manual abilities are their only qualifications.

As the person and the work environment change, the fit between them also changes. The person will need new experiences that will maximize his or her employability and career satisfaction and success. Likewise, if organizations value their employees' commitment, they must ensure that as individuals develop their careers in the organization they are continuing to make a good, if different, contribution to it.

Careers as Personal Development

Other theorists consider the career to be an exercise in personal development that takes a lifetime to complete. It is therefore related to patterns of human development and aging and involves different periods of exploration, growth, establishment, stabilization, and maintenance as people age and their interests, aspirations, and personal and family circumstances alter over time. Super and Savickas (see Savickas, 2002) are major theorists who have attempted to place career development within a perspective of overall adult development. The application of such theories to career management suggests that to an extent one can anticipate some likely phases and changes in one's careers and that one must monitor and manage one's goals, health, and energy as well as one's work.

In addition, women's careers have been observed to have sequential patterns different from men's careers (e.g., Bardwick, 1980). Childbearing can be done only by women; child rearing can be done by men as well as women, but since time immemorial, different societies have organized their labor around the idea that child care is a woman's natural forte. The current trend to two-career couples and the establishment of women's careers in such a way that they postpone childbearing until the are at least in their 30s (often to ensure that their careers are securely established first) and that they attempt to compete equally with men for more senior jobs later in their careers changes women's career patterns substantially, making them more like men's

career patterns despite the typical interruptions (Friedman & Greenhaus, 2001). Again, the key point is that because of the influence that career and family life have on each other, they must be jointly *managed* by individuals and by couples. In this sense, career management is again part of life management.

Strategies of Career Self-Management (CSM)

What does all this theory mean in terms of what one needs to do to manage one's career (CSM)? CSM has affinities to business management. Like businesses, careers can be rationally planned, and career plans can be precisely executed, but can also be modified in the light of experience. This approach conceptualizes career management as a problem-solving, decision-making process. If individuals have problems to solve and decisions to make, this should be done rationally, based on maximum information. Like effective businesses, individuals can

- plan their activities in relation to their internal resources and external opportunities;
- · break the plan down into steps and execute it; and
- monitor the results and modify their actions accordingly.

As in business, in CSM, information gathering is an important phase. The process takes account of both the internal resources of the person and the external context indicated in the "social structure" material outlined earlier. In an initial career exploration stage, the individual builds awareness of self and environment—for example, interests, values, and talents (self) and opportunities, options, and obstacles (environment). This awareness enables a plan to be expressed in terms of goals sought—for example, a tentative choice of occupation. The plan can then be implemented on a step-by-step basis, for example, through the choice of educational programs, the seeking of family support, and the development of interpersonal skills. Feedback from the environment enables the individual to modify goals and methods of implementation as he or she goes.

One rational model is the Career Information Processing (CIP) model (Peterson, Sampson, & Reardon, 1991), which considers the way in which people weigh information about their careers. By following the CIP model, the authors considered that students can "formulate personal goals and action plans designed to proactively enhance (their) careers" and "develop personal, employment related skills and information" (Reardon, Lenz, Sampson, & Peterson, 2006, p. ix). The skills in the decision-making level are labeled "CASVE," an acronym for a repeated cycle of communication, analysis, synthesis, valuing, and execution, which the authors believed are involved in career decision making. The elements of the cycle are

 communication—recognition of the problem or the choice to be made;

- analysis through questioning, information gathering, and reflection:
- synthesis in terms of identifying potential solutions;
- valuing options in relation to the person's values and the options' likely effects—ranking options and committing to the best; and
- execution including trying out and review.

A key element is information about the various occupational options available. That information may come from professional and trade bodies, employing organizations, friends or relations in the occupation, and government information sources. For example, in the United States, statistical information is available annually from the U.S. Department of Labor on hundreds of different popular occupations, listing current employment, projected employment change, and information on employment prospects in each one.

One problem about career planning is that careers are lifelong events. But in the long term, these trends cannot be relied on and will be replaced by others. The careerist of the future will need to be able to improvise as well as plan.

Another way of thinking about CSM is in terms of thinking of your career as a "resource" (Inkson, 2007). It is commonplace nowadays for organizations to talk and think about their employees as resources, as in HRM. The HRM approach to careers is dealt with in the second half of this chapter. But you can also consider your career resources from a personal point of view. In one formulation, you can develop three different types of career capital: knowing-why (motivation and values), knowing-how (skills, expertise, and experience), and knowing-whom (contacts and networks). Your assets in these three areas will change over time, not just in their extent but also in their nature (Arthur, Claman, & DeFillippi, 1995; Inkson & Arthur, 2001). It is worthwhile checking out periodically how these shifts are occurring and what they mean for your career direction: The Intelligent Career Card Sort (ICCS) Instrument enables you to do just that (see http://www.intelligentcareer.net).

As your career progresses, you will build your career assets, but you will also notice that aspects of these become depleted or become obsolete. Each time you invest your capital in a new job or occupation, you are hoping it will appreciate rather than becoming devalued (Inkson & Arthur, 2001).

THEORY AND APPLICATIONS 3: ORGANIZATIONAL CAREER MANAGEMENT

According to many experts on HRM, careers should be determined, at least in part, by the employer's staffing priorities. A business that pays an employee his or her salary is a legitimate stakeholder in that employee's career and will often seek to develop, control, and exploit that career

for commercial advantage, while no doubt also hoping that the employee too will benefit.

OCM, therefore, is the counterpart of CSM: It is the activities that organizations undertake to manage the careers of their employees to mutual advantage. Thus, while most people would understand that ultimately any individual is responsible for his or her own career, the organization provides a vital framework of opportunities for and constraints on its employees' careers and, often, intervenes actively through HRM activities such as hiring, transferring, developing, promoting, and laying off staff. Sophisticated organizations can achieve a degree of certainty and stability for their future requirements for staff, skills, and commitment in the long run by encouraging its employees to develop long-term, lifetime careers as loyal servants of and as developing contributors to the organization.

The idea of organizational career management organizations is an important effect of what Barney (1991) called the "resource-based view of the firm." This view of company strategy focuses on its human resources—for example, their skill, expertise, experience, motivation, and teamwork—as a major basis of competitive advantage and on the fact that human resources can be systematically increased in value over time by appropriate experience and development in the company. That is, as their careers provide employees with new experiences and expertise, their value to the organization is increased. Careers, therefore, are "repositories of knowledge" (Bird, 1996), specifically knowledge of value to the organization. Therefore, organizations must know of and plan for the competencies they need in order to succeed and must either capture them in the careers of the people they recruit from outside the organization or develop them in the careers of present employees. So organizations have a very good reason to intervene actively to influence the careers of individuals, by attracting outsiders with the right expertise to join, by persuading insiders with the right expertise to stay, and by placing and developing these people where they will have greatest effect.

A key aspect is the enhancing of employees' commitment to the organization (Meyer & Allen, 1997). In an environment of high labor turnover, organizations often need at least a core group of long-term staff that has a sense of the organization's past, its culture, and its key skills to provide continuity and act as guardians to this institutional memory. The package of rewards and incentives that the organization offers is very important here. By offering benefits such as good holidays, health programs, savings programs, recreational activities in company facilities, social and country club memberships, travel and educational benefits, access to housing loans, and employee assistance programs, employers can make it difficult for their staff to contemplate leaving. Equally important are arrangements for remuneration: An employee on a flat salary level has a considerable incentive to leave the organization; another on a constantly increasing salary with a pension plan tied to the organization and a long-service gratuity has every reason to stay. Lastly, strong, appealing "organization cultures" can be used to engage the individual psychologically and socially in being part of a greater enterprise.

Against this, there is always the possibility that, in the future, the organization will run into difficulties and will be forced to downsize or to change its strategic direction in a way that would render its long-service staff obsolete. Severing those long-term relationships is likely to be painful for both the organization and its people. A smart organization looks ahead and tries to achieve the right balance of organizational careers and flexible careers among its people.

Organizational career management is often based on the development of an internal labor market in which, wherever possible, vacancies are filled from within the organization. That way, positions at the lower levels of the organization can be filled from external sources, and these new recruits can be socialized and developed so that they gain the right background knowledge, skills, and attitude to move up to higher positions. The configuration of the hierarchical structure of the organization can provide a "career system," or a set of career pathways. That way, members' progress through the hierarchy and between departments in pursuit of their career goals can simultaneously develop them in ways conducive to meeting company goals and their goals.

These powerful internal labor markets reached their high point in the 1970s and 1980s in many giant corporations in the United States, Europe, and Japan. In many Japanese organizations, for example, young entrants to the organization were offered "lifetime employment"—a career in a paternalistic employing organization in which their continuing employment with substantial benefits and a supportive social environment for themselves and their families was guaranteed.

The Destabilization of Organizational Careers

Unfortunately, the internal labor markets, hierarchical structures, strong organizational cultures, and lifetime employment that were idealized at that time had a problem. They created rigidities that eventually reduced competitiveness under conditions of change. From the 1980s, staff numbers in many organizations were reduced by downsizing; organization structures were flattened, reducing opportunities for advancement; and work was outsourced from permanent employees to casual contractors or relocated to offshore locations with lower labor costs. At the same time, information technology displaced traditional skills and required new ones, job and occupational boundaries were broken by new emphases on "multiskilling" and "teams," and the return of more women to the workforce introduced employees who needed new, more flexible patterns of work.

As jobs were destabilized, so were employees' long-term careers. Employees who had felt secure lost their jobs or had to lower their expectations, and Japanese lifetime employment lost its gloss as Japanese organizations were forced to

downsize. Whether one is an individual or an organization, it is perhaps becoming both more difficult and less sensible to try to career plan far ahead, and career improvisation by both parties is increasingly called for. The result has been a growth in new forms of career—alternatives to the stable organizational and occupational career forms: for example, boundaryless careers (Arthur & Rousseau, 1996), protean careers (Hall, 2002), and postcorporate careers, which are explored by Yehuda Baruch in Chapter 62.

Mutual Benefits From OCM

Despite these instabilities in external and internal labor markets, smart organizations can still do much to make good management of their employees' careers, an important element in their planning. Their staffing systems and philosophies (e.g., filling all positions from within the company) can enable strategic objectives to be enhanced by means of career incentives and plans for employees. The HRM elements of staff recruitment, placement, training, development, evaluation, and remuneration can be can be integrated to provide a sense of coherence in the employee's perception of a developing company career.

While the key objective of all of this from the organization's perspective is to recruit and develop superior human resources in order to gain a competitive advantage, this is not necessarily coldly exploitative. Many people still spend much of their working lives in a close, symbiotic relationship with a benevolent employing organization that assists them to find security in their careers, not only because it is commercially advantageous to do so, but also as an expression of social responsibility. In addition, employing organizations can make lots of career "goodies" available to their employees in the form of their HRM and human resource development activities. Just as smart organizations fashion their HRM to maximize their human resources in relation to their strategic plans, smart employees can take advantage of these same HRM practices to enhance their own career development.

What are the key management and HRM practices that constitute effective career management? Some of the day-to-day management practices that organizations employ in any case, without any thought about careers, can make a real difference. In the following, six key practices are summarized.

Staffing Policies

The philosophy and practices that underlie an organization's planning of its workforce and filling of its vacancies are crucial determinants of career opportunities for those within. A critical factor paralleling the organization's sourcing of physical components to a manufacturing process is the *make or buy* decision. Does it seek to "make" its appointees by developing promising staff within the organization or "buy" them by hiring outsiders who already have the

skills needed? "Making" favors the notion of the long-term development of a committed workforce whereas "buying" enables the organization to add new ideas through recruitment and avoids the time and the expense that employee development takes. Good organizations think about and plan their workforces strategically and systematically, trying to predict future human resource needs and to figure how to meet them.

At a more mundane level, the quality of human resource information systems (HRIS) and informal networks of the organization in communicating opportunities are all important. Job postings, possibly the most frequently practiced of all organizational interventions into employees' careers, are a method of publicizing within-organization vacancies to all staff by means of organizational media such as company magazines, bulletin boards, and intranets. In succession planning, potential successors are identified if a position is vacated. In the dual career path system, special tracks for advancement are created for professional employees who want to advance but who want to remain professional specialists rather than becoming managers. Employees who want to get ahead monitor internal sources of information closely and pay attention to the intraorganizational career paths that appear to result in success.

Selection and Orientation

The normal staffing function of hiring employees and introducing them to the organization has a clear influence on careers. For some employees this will be the first major job in their careers, for others it will represent an important transition point. *Organizational entry* takes place in a series of stages: *recruitment* (attracting the right candidates), *selection* (choosing those who have a good fit with the organization), *orientation* (introducing the individual to the organization), and *socialization* (indoctrinating the new hire into the organization's norms and expectations; Wanous, 1992). Because "first impressions count," these stages may critically shape the employee's attitude to work, to the job, and to the organization.

Good practice in this area benefits the organization by increasing the likelihood of favorable attitudes and commitment to the organization. But prior to organizational entry, the individual is likely to have expectations of what lies in store, and these may well be higher than what the job actually offers: *Realistic job previews* are advocated as a means of ensuring that candidates join the organization and fit its culture (Wanous, 1992).

Training and Development

This area is about increasing the value of the individual to the organization. *Training* provides employees with basic skills to do their jobs and, therefore, directly increases their value to the organization. Whether it increases the value of the individual in settings other than the job for which it has been designed depends on how far the skills learned through

training can be generalized to other situations, including those that lie outside the current organization. To equip employees for broader or more responsible jobs beyond their current ones, an employer may offer opportunities for *employee development*.

Some development is built in as part of the individual's day-to-day work experience. For example, in *job rotation*, an employee moves around between various, different, and often contrasting jobs and functions, thereby acquiring a wider range of skills. *Developmental assignments* involve adding responsibilities, projects, or secondments to the employee's job, possibly on a temporary basis, partly to get the work done, but also to extend the individual's potential for subsequent stages of the career. Examples might be having the employee complete a special short-term project or join an interdepartmental task force. *Permanent transfers and promotions* typically not only advance the career in terms of status, but also involve the individual in working on fresh problems and with new people.

In other cases, the development may take place within the organization, but as an "add-on" program to supplement normal work experience. Most common are in-house programs with expert speakers and trainers on technical and managerial techniques, often organized for groups of employees, so that morale and teamwork are developed as well as individual skills. In recent years, outdoors educational activities in which employees undertake such activities as rafting, orienteering, and solving outdoors problems in groups has gained credibility as a means of developing staff self-confidence and teamwork.

In addition, many organizations offer support for formal education including continuing professional development by sending employees away to undertake such experiences, allowing them time off from their jobs, and/or paying fees and other costs. Again, the idea is to "add value" to the employee for the long-term benefit of the organization, but individuals may also gain in terms of their own development.

Training and development is not cost free. It incurs both a direct cost and an opportunity cost in terms of the time of the employees who are involved. Thus, it is an investment by the organization. Whether it pays off depends on the relevance of the activities chosen to the organization's future needs, and the retention within the organization of the staff members who are developed. While the development programs previously outlined are usually management initiatives, smart employees can volunteer for and utilize training and development to enhance their personal career capital. The fact has to be faced that while some employees will recognize that an organization that has given them development opportunities deserves some loyalty in return, others will simply "take the development and run"—to other organizations (Ito & Brotheridge, 2005).

Evaluation of Potential and Performance

As previously indicated, in order to make good career decisions individuals need good information about current

performance and future potential. Organizations often gather basic information on staff members when they recruit them, but this needs to be regularly updated. Most organizations have performance appraisal systems to assess the performance of their staff on a periodic (often annual) basis and to provide feedback to them. Increasingly, 360-degree feedback through which the person's performance is evaluated not just by his or her boss but also by peers and subordinates is used to give a more complete picture. Appraisal systems often aim to provide a forward-looking perspective in which future goals are set for the future and the individual receives ongoing coaching to achieve them. This approach enables the individual's career planning to be focused on, with past and future contributions being focused on by the person and in organizational HRM systems considering further development, transfer, and promotion.

Another evaluation process is the assessment center (Howard, 1997), in which employees are assessed by means of tests, interviews, and work simulations and are judged by expert assessors across a range of skills and aptitudes relevant to their long-term potential in the organization and for the wider career.

Coaching and Mentorship

An important organizational aid to career management is support and advice in career development from others who are in a good position to offer guidance. Most people talk regularly about their careers with others including family and friends. Within the organization, a person's direct superior may have a strong potential influence on his or her career, in terms of personal coaching, counseling, and sponsorship of the person in the wider organization. An annual performance evaluation interview, for example, may be a good opportunity for an employee to confide in a supportive boss and try to do some career planning.

Mentorship is a process of bringing together a senior and a junior person, so that the senior takes the junior "under his or her wing" and offers guidance on a range of issues including career. A mentor is not necessarily the person's direct superior and need not even be a member of the same organization. Many organizations, however, now have structured mentoring programs in which junior staff are formally assigned to experienced mentors for periodic assistance. It may be that the best type of career management support an individual can receive will come not from individual mentors but from developmental networks including both organizational and nonorganizational advisors and supporters (Higgins & Kram, 2001).

Organizational Career Development

Some organizations provide direct career development assistance to employees. These interventions include workbooks, computer-assisted career management programs, career workshops, courses for minorities assisting them to promote their own careers, and individual career counsel-

ing. One practice that has taken off, regrettably perhaps, in recent years, is outplacement, meaning organizational initiatives to assist employees whose jobs have been terminated, mainly through restructuring, to cope with the disruption to their careers and find new employment and career direction.

While there is a finite risk that open-ended career exploration by individuals will persuade them that the best thing for their career is to leave the organization, proponents of organizational career management argue that such support actually builds employee commitment, identifies potential highfliers, and enables employees to be developed in line with business needs (Gutteridge, Leibowitz, & Shore, 1993).

INTERNATIONAL CAREER MANAGEMENT

An important and developing area of career management is the management of international careers in which careerists have to integrate expatriate assignments, foreign migration, and travel into their developing careers.

The process of globalization replaces conventional organizational forms with multinational organizations and international strategic alliances of firms, affecting the career locations of millions of people. New multinational companies retain control and disseminate expertise by transferring employees to subsidiaries in foreign settings. Companies and countries build their human resources by opening their boundaries and borders to immigrants with suitable backgrounds, creating "brain drains" of talent. Political refugees seek a better life abroad. Young people from developed countries seek new cultural experiences. Increasingly, careers are international.

A major type of international career experience is the expatriate assignment, in which managerial or professional staff are sent usually from the base country of the multinational to an overseas subsidiary on a temporary basis—usually several years—as a means of managing and controlling it (Black, Gregersen, Mendenhall, & Stroh, 1999). The management of the careers of expatriates both during expatriation and after return, both by the expatriates and by their organizations, poses special problems—for example, cross-cultural career adaptation, family issues, reintegration into an organization—and needs to be carefully managed by both individual and organization.

In other cases, the impetus for international travel comes from the individual rather than a sponsoring organization, and people migrate to other countries temporarily or permanently in search of better lives and careers and have to find their own means of career management, often in an alien and hostile environment. Because of the internationalization of careers, more and more people see themselves as "global citizens" or "citizens of the world": They have no firm national identity and will pursue their lives and careers wherever the best opportunities are in terms of their priorities.

CONCLUSION

Career management comes in two forms: CSM and OCM. Because of this book being a management book rather than a self-management book, this chapter includes more material on the latter, but there is debate as to the relative influence of the individual and the organization over careers. In times of rapid societal, economic, and organizational change, of knowledge-based enterprise, and of contingent work, it is becoming accepted that individuals are becoming more responsible for their own career management.

Much career development theory and practice is in the CSM tradition. It assumes that career management should be practiced by individuals in relation to their own careers and that the career management can therefore be improved by empowering individuals to take charge of their careers, maximize their information about themselves and the world of work, improve their career decision-making ability, and offer them the support and services of skilled counselors. Readers considering their own careers are urged to research and to adopt such strategies.

On the other hand, managers and organizations can manage the organizational careers *environment* in which individuals pursue careers, to mutual advantage, in a wide variety of ways broadly derived from the principles of strategic management and HRM. Managers can make a difference directly as mentors and confidantes of their staff and by seeing the career development of their subordinates as a key part of their responsibilities. They can also do so indirectly through the background activities on which careers depend, in areas such as human resource planning, employee hiring, socialization, remuneration, and the development of a structure and culture sympathetic to members' career aspirations. All managers have their own careers to think about—as they would be done by, so should they do.

In terms of further reading, the broad literature on the various theories, forms and practices of career management, including both CSM and OCM, are best covered in authorititative textbooks by Greenhaus, Callanan, and Godschalk (2000) and Inkson (2007), the latter summarizing current theory, research and practice in careers through the use of a range of powerful metaphors. Peiperl and Gunz (2007) provide an excellent compendium of state-of-the-art knowledge on a wide range of career phenomena and issues, and Greenhaus and Callanan (2006) an authoritative encyclopedia of career terms.

The main current theories of career development from a nonmanagement perspective are covered by Brown and Associates (2002) and subsequent editions of the same book, while Reardon, Lenz, Sampson, and Peterson (2006) provide a textbook of CSM, which utilizes the reader's own career thinking as a basis for understanding the topic and has information on many important aspects.

Arthur, Inkson, and Pringle (1999) provide researchbased insights into "the new careers"—new flexible forms of career development that seem in recent years to have replaced traditional career forms as individuals seek to exert more control over their own careers. The main theories of these new approaches are those of the boundaryless career (Arthur & Rousseau, 1996), and the protean career (Hall, 2002; see Baruch [Chapter 62] for further information).

For good summaries of organizational career management, see Baruch (2004) and Gutteridge, Leibowicz, and Shore (1993). Many textbooks of human resource management, such as those by Cascio (2003) and Desimone, Warner, and Harris (2003) also include chapters on organizational career management, and Baruch and Peiperl (2000) provide a survey-based account of the most frequent OCM practices in today's organizations.

REFERENCES AND FURTHER READINGS

- Arthur, M. B., Claman, P. H., & DeFillippi, R. J. (1995). Intelligent enterprise, intelligent career. *Academy of Management Executive*, 9(4), 7–22.
- Arthur, M. B., Hall, D. T., & Lawrence, B. S. (Eds.). (1989).
 Handbook of career theory. Cambridge, UK: Cambridge University Press.
- Arthur, M. B., Inkson, K., & Pringle, J. K. (1999). *The new careers: Individual action and economic change*. London: Sage.
- Arthur, M. B., & Rousseau, D. (Eds.). (1996). *The boundaryless career: A new employment principle for a new organizational era*. New York: Oxford University Press.
- Bardwick, J. M. (1980). The seasons of a woman's life. In D. G. McGuigan (Ed.), *Women's lives: New theory, research and policy* (pp. 35–55). Ann Arbor: University of Michigan.
- Barney, J. (1991). Firm resources and sustained competitive advantage. *Journal of Management*, 17(1), 99–120.
- Baruch, Y. (2004). *Managing careers: Theory and Practice*. Harlow, UK: FT-Prentice Hall/Pearson.
- Baruch, Y., & Peiperl, M. A. (2000). Career management practices: An empirical survey and implications. *Human Resource Management*, 39, 347–366.
- Bird, A. (1996). Careers as repositories of knowledge: considerations for boundaryless careers. In M. B. Arthur & D. M. Rousseau (Eds.), *The boundaryless career: A new employment principle for a new organizational era* (pp. 150–168). New York: Oxford University Press.
- Black, J. S., Gregersen, H. B., Mendenhall, M. E., & Stroh, L. K. (1999). *Globalizing people through international assignments*. New York: Addison-Wesley Longman.
- Brown, D., & Associates. (Eds.). (2002). Career choice and development (4th ed.). San Francisco: Jossey Bass.
- Cascio, W. F. (2003). Managing human resources: Productivity, quality of life, profits (6th ed.). New York: McGraw-Hill.
- Dawis, R. V. (2002). Person-environment correspondence theory. In D. Brown & Associates, *Career choice and development* (4th ed., pp. 427–464). San Francisco: Jossey-Bass.
- Desimone, R. L., Werner, J. M., & Harris, D. M. (2003). *Human resource development* (3rd ed.). Mason, OH: Thomson South-Western.
- Friedman, S. D., & Greenhaus, J. H. (2001). *Allies or enemies:* How choices about work and family affect the quality of men's and women's lives. New York: Oxford University Press.

- Greenhaus, J. H., & Callanan, G. A. (2006). *Encyclopedia of career development*. Thousand Oaks, CA: Sage.
- Greenhaus, J. H., Callanan, G. A., & Godschalk, V. M. (2000). Career management (3rd ed.). Fort Worth, TX: Dryden Press.
- Gutteridge, T. G., Leibowicz, Z. B., & Shore, J. E. (1993). *Organizational career development*. San Francisco: Jossey-Bass.
- Hall, D. T. (2002). *Careers in and out of organizations*. Thousand Oaks, CA: Sage.
- Higgins, M. C., & Kram, K. E. (2001). Reconceptualizing mentoring at work: A developmental network perspective. Academy of Management Review, 26(2), 264–288.
- Holland, J. E. (1997). Making vocational choices: A theory of vocational personalities and work environments (2nd ed.). Odessa, FL: Psychological Assessment Resources.
- Howard, A. (1997). A reassessment of assessment centers: Challenges for the 21st century. *Journal of Social Behavior and Personality*, 12(5), 13–52.
- Inkson, K. (2007). *Understanding careers: The metaphors of working lives*. Thousand Oaks, CA: Sage.
- Inkson, K., & Arthur, M. B. (2001). How to be a successful career capitalist. *Organizational Dynamics*, 31(3), 48–61.
- Inkson, K., & Elkin, G. (in press). Landscape with travelers: The contexts of careers in industrialized nations. In R. van Esbroeck & J. Athanasou (Eds.), *International handbook of career guidance*. Amsterdam: Kluwer.
- Ito, J. K., & Brotheridge, C. M. (2005). Does supporting employees' adaptability lead to commitment, turnover, or both? *Human Resource Management*, 44(1), 5–19.
- Johnson, M. K., & Mortimer, J. T. (2002). Career choice and development from a sociological perspective. In D. Brown & Associates (Eds.), *Career choice and development* (4th ed., pp. 37–81). San Francisco: Jossey Bass.
- Lent, R. W., Brown, S. D., & Hackett, G. (2002). Social cognitive career theory. In D. Brown & Associates, *Career choice and development* (4th ed., pp. 255–311). San Francisco: Jossey-Bass.

- Meyer, J. P., & Allen, N. J. (1997). *Commitment in the work-place: Theory, research and application*. Thousand Oaks, CA: Sage.
- Parsons, F. (1909). *Choosing a vocation*. Boston: Houghton Mifflin.
- Peiperl, M. A, & Baruch, Y. (1997). Back to square zero: The post-corporate career. *Organizational Dynamics*, 25(4), 7–22.
- Peiperl, M. A., & Gunz, H. (Eds.). (2007). *Handbook of career studies*. Thousand Oaks, CA: Sage.
- Psychological Assessment Resources. (2001). Welcome to the Self-Directed Search. Retrieved August 29, 2007, from http:// www.self-directed-search.com/
- Peterson, G. W., Sampson, J. P., Jr., & Reardon, R. C. (1991). *Career development and services: A cognitive approach*. Pacific Grove, CA: Brooks/Cole.
- Reardon, R. C., Lenz, J. G., Sampson, J. P., Jr., & Peterson, G. W. (2006). Career planning and development: A comprehensive approach (2nd ed.). Mason, OH: Thomson Custom Solutions.
- Savickas, M. L. (2002). Career construction theory: A developmental theory of career behavior. In D. Brown & Associates (Eds.), Career choice and development (4th ed., pp. 149–205). San Francisco: Jossey Bass.
- Spokane, A. R., Meir, E. I., & Catalano, M. (2000). Personenvironment congruence and Holland's theory: A review and reconsideration. *Journal of Vocational Behavior*, 57(2), 137–187.
- Sturges, J., Guest, D., Conway, N., & Mackenzie Davey, K. (2002). A longitudinal study of the relationship between career management and organizational commitment among graduates in the first ten years at work. *Journal of Organiza*tional Behavior, 23(6), 731–749.
- Wanous, J. P. (1992). Organizational entry: Recruitment, selection, orientation and socialization of newcomers (2nd ed.). Reading, MA: Addison-Wesley.

CAREERS IN TRANSITION

YEHUDA BARUCH

University of East Angelia

The world of careers has gone through a number of significant changes, with a major transformation in the 1980s-1990s of the 20th century. Earlier, the typical career system was organizational, highly structured, and hierarchy based. Individual progress was much due to tenure and compliance and would imply stepping up the ladder. The organization assumed the role of command and control, moving people around (a chess metaphor), but also taking care of them in a patriarchal way (family metaphor). The transition, which began in the last century, meant a shift to dynamic career environment, constant restructuring of organizations—hence breaking the traditional ladders—more focus on individualization of careers, and a change of the organizational role to enabler, supporter, and challenger. We expect this world of careers to prevail in the 21st century, and the career models discussed in this entry are presented to open the mind to the new realm of work.

Careers can indeed be seen as a sequencing of an individual's life, work roles, and experiences, when limiting the observation to the individual perspective. Nevertheless, careers take place in specified social environments and, in particular, in organizations. In the early days, before the industrial revolution, the career path was very clear and rarely changed: Men would follow their father's occupation (in most cases, in agriculture, in rural areas, working the land). Women would marry and become housewives.

All of this changed with the industrial revolution. The organization was reinvented for the purpose of industry (and later, services). Building on the classical hierarchy model, organizational structures became the landscape for career journeys. The structure became the ladder for upward

promotions. Continuous supply of labor and increased demand for the products sustained the model up to the later stages of the 20th century. Traditional linear career models, as typified by the research of Super (1957), emphasize upward movement within one or two organizations over an individual's lifetime. Even though the linear model may not have accurately represented most careers of that time, it was still portrayed as the ideal, desired career type. These types of career models tend to emphasize the attainment of extrinsic rewards including a high salary, quick rates of promotion, and job perks (such as company cars, parking places, offices, etc.).

The social, economical, and technological developments in the last part of the 20th century have caused these models a major shake-up. IT revolution, coupled with the growth of services and globalization, caused the collapse of this career model as the ruler in the career realm. It has not totally disappeared (it still exists in armed forces, some civil services, and even some organizations), but new models emerged alongside the old bastions of the traditional model.

THEORY

Conceptual Models of Individual Careers

Examination of the roots of modern career theory brings us to Hughes' (1937) argument about the importance of ordering of work experience and logic to the linkages between successive positions occupied over time. This "moving perspective of time" means that career concept implies a

relationship between employer and employee over time. Career is more than a single job, a single position, or a single role. It is a developmental process of progression. Both individual and organization may be equal partners in the game and share duties and responsibilities.

The wave of changes in the last two decades of the 20th century meant that the system became more dynamic—sometimes fluid and turbulent. To explain the phenomenon, Denise Rousseau (1995) introduced the new psychological contract, which had to be established because the traditional model became invalid.

Based on the new psychological contract, the boundaryless career, and the issues of diversity and global careers, the chapter will deal with specific models such as the protean career, the postcorporate career, the intelligent career (or career capital), career resilience, the multidirectional career, employability and career proactivity, and the kaleidoscope career. These are compared and contrasted with the traditional model of stable structure and career tournament.

Matching Needs

While the following models are focusing at the individual level, the first career model presented here examines career processes from a dual point of individuals and organizations. Herriot and Pemberton (1996) presented a model that places in its core the concept of a match that is required between individuals and their employing organizations in terms of needs, wants, and provisions. It is a dynamic model in the sense that, in line with the open system approach, the nature of events is cyclical. The model views organizational career as a continuous sequence of renegotiations of psychological contracts (see the elaboration on psychological contracts later in this chapter).

The model associates the business environment with organizations in terms of strategy, structure, and processes. It depicts the internal labor market (ILM) as an ideal approach, namely, promoting from within is deemed to be the best for career management, though absolute ILM never occurs in this practice, and many organizations can benefit from new talent recruited from the external environment, in particular when a change is needed.

From the individual perspective, the social context in which people grow and develop influences their values, norms, and beliefs. These, in turn, influence their career aspirations, career choice, and progress. People's identities will determine what they would wish to gain from the organization. At the core of Herriot and Pemberton's model lies the element of mutual recognition, negotiation, and agreement about the "give and take"—the psychological and contractual agreement to which organizations and individuals consent (or believe they agreed upon). It is the equilibrium of balance between what people offer to the organization, what they expect in return, and vice versa. Other influential factors on this core process are both the balance of power and the communication between the parties. These have implications for the two types of relationships

that may exist between the individual and the organization: transactional, calculated "deals" and relational, even emotional, relationships.

If there is a breach of the "contract" (e.g., poor perception of procedural or distributive justice), people may try to renegotiate the contract or exit the organization. If, on the other hand, the contract is perceived as fair, the positive interpretation will be reflected in a deepening relationship.

Career Success

Career success is a desired outcome for each individual. Each individual may have various desired outcomes that are different from career aims of others. The possible measures to assess such desired outcomes and how far they reached are complex. Nevertheless, a clear distinction exists between two sets of career outcomes: those representing "external career success" and those representing "internal career success."

Commonly accepted measures for external career success are associated with *advancement*—ascending the hierarchy and receiving more income, power, and reputation (status).

Commonly accepted measures for internal career success are mostly *psychological*: satisfaction, recognition, self-esteem, and self-actualization. To these, the new realm of careers added career resilience, in both meanings of resilience—the toughness of spirit in confronting career crisis and flexibility or pliability in adapting to ever-changing labor markets.

Other elements that represent a blend of the internal and the external are employability, professionalism, autonomy, entrepreneurship, self-control, and learning (gaining new skills, abilities, and competencies).

External measures were the ones appreciated within the traditional career system. Whyte's (1956) "organization man" concept perceives people as parts of the system in organizations, in which they act like a cog in the machine and strive to climb up the ladder. Although perceived outdated, this concept is still alive and kicking, for men and women, too. Alongside it, however, new ways of thinking about careers have emerged, and they will be discussed further here.

Derr (1986) came up with the idea of "the new careerists" in the mid-1980s. His framework identified five measures for career success, contrasting, or at least expanding, the traditional measures of career success. Derr's five dimensions of career success and their meanings are as follows:

- Getting ahead: motivation derived from the need to advance on both the professional stand and the organizational ladder
- 2. Getting secure: having a solid position within the organization
- Getting high: being inspired by the nature and content of the work performed

- 4. Getting free: motivated by need for autonomy and ability to create own work environment
- Getting balanced: attaching equal or grater value on nonwork interests

To sum up, career success may be examined via explicit measures that are relatively objective and comparable (external), as well as by the subjective feeling of the person (internal). Both are important for individuals and play crucial roles in motivating and directing people.

New Psychological Contracts

The current business environment is characterized by perpetual changes. Much of it is involved with organizational restructuring, redundancies, and downsizing. To attract and keep the right people, organizations and employees should build new psychological contracts that reflect this new realm. Organizational psychologists originally suggested the idea of psychological contracts in the early 1960s. In laymen's terms, the psychological contract is "the unspoken promise, not present in the small print of the employment contract, of what employer gives, and what employees give in return" (Baruch & Hind, 1999, p. 299). This is a real, though not explicit contract, which is distinct from the formal, legal employment contract in its context and expected impact.

The major changes of the 1980s and 1990s meant that with wide scale redundancies and "fit to survive," organizations ceased to offer job security and, as a result, new psychological contracts evolved, whereby loyalty and mutual commitment have lost their highly significant relevance. Organizational commitment was commonly accepted as the desired norm, for both organizations and employees. This indicates one of the problems with the downsizing trend that led to very negative outcomes. Organizational commitment, motivation, and satisfaction are associated with each other. High levels of organizational commitment, motivation, and satisfaction would subsequently lead to an improved performance and a tendency to stay in the organization. With the diminished mutual commitment and trust-based relationship, however, the relevance of the construct of organizational commitment has declined. New ideas were introduced to compensate for the loss of balance in the relationship equation. Employability is one of them: The organization is expected to invest in the employees in terms of training and development, and the employee is expected to exert effort and be flexible. Employees gain a dynamic job security, namely, the ability to find appropriate new job in case they are made redundant, and the company is released from the lifelong obligation.

Among the factors that enable the transition is the decline in the power and influence of trade unions. Individual negotiations are replacing collective bargaining. These are more flexible, but the employee can find a worsening balance toward the organization's bargain power.

While it is fit for the emergence of individualistic society, the transformation just described was not always welcomed by employees and society as a whole. Each round of redundancy generates disillusionment and feelings of betrayal on the employees' side, as suggested by Brockner, Grover, Reed, and DeWitt (1992). Much has been taken from them, and the agreement is more of a necessity rather than will. There is no longer life term employment or mutual loyalty. There is more complexity and less clarity. A higher level of risk exists, and the relationships no longer rely on "trust." Under the new deal, employees offer long hours, assume added responsibility, provide broader skills, and tolerate change and ambiguity, whereas the employers offer high pay, reward for performance, and above all, a job. No single archetype mode fits all; diversity and flexibility are the new rules.

New Deals Under the New Psychological Contracts

Under the Old Deal, the employee offered loyalty, conformity, and commitment. The employer offered security of employment, career prospects, training and development, and care in trouble. In return, the employee may have expected lifelong employment, pay related to tenure, and vertical promotion. Respectively, the employer expects, in return, to have the employee consider the organization's needs over individual needs. In general, there are a standard, rigid structure and work pattern and predictability, and the dominant values are loyalty, stability, and paternalism.

Under the New Deal, the employee offers long hours, added responsibility, broader skills, tolerance of change and ambiguity, and willingness to work in a dynamic situation (as long as it fulfills their needs). The employer offers high pay, rewards for performance, and above all, a job (employment as long as business needs exist). Employees expect to be entitled to personal development, investment in employability, a learning environment, updated technology, and flexibility. In return, the employer expects self-reliant, resilient employees ready for flexibility. In general, an unconventional, flexible structure and work pattern and uncertainty exist, and the dominant values are self-reliance, versatility, and dynamism.

The Boundaryless Career

The new psychological contracts fit well with contemporary concepts and terminology that emerged in the 1990s. One of the first terms to depict the new ways of careers is the *boundaryless career*. Under this approach, individuals can move from one company to another to pursue the best opportunities for their professional development, with no negative stigma of a failure. Career progress comes not only from intracompany hierarchical advancement but also, and even more often, from intercompany self-development. Under this perspective, careers can be viewed as boundaryless, as the borders between organizations and work environments become blurred. To flourish in this new

environment, individuals should become self-reliant and free themselves from dependency on the organization as the prime provider of structure to a career. Developing new competencies and a new architecture to careers becomes the role of individuals.

Under the notion of boundaryless careers, many employees deliberately choose to leave their employer for a better job offer elsewhere. Moreover, this organizational exit is not perceived as a negative career move.

Intelligent Career

The concept of *intelligent career*, introduced by Arthur, Claman, and DeFillippi (1995), may be defined as the sequence of work roles undertaken at the individual's own discretion and with personal goals in mind. In an intelligent career world, the fundamental element is having personal goals and choosing employment that helps to fulfill them. It is also the key to long-term employability, through the learning that careers can accrue in a new, increasingly knowledge-based, economy.

Intelligent career theory employs the "know why, know how, and know whom" classification as a set of career competencies, introducing these as the three components of intelligent career:

- a. Knowing why: This refers to why the person is involved within the realm of work—the motivation people bring to their roles. Know why relates to the aspirations and underpinning values, including ethical values, and is associated with personality traits. It also includes any commitments we have made to other constituencies of our lives (e.g., family, community) and the way people seek to accommodate them through work and leisure.
- b. Knowing how: This refers to *how* we work and is concerned with the skills, abilities, and competencies (e.g., mathematical competencies) that enable people to thrive in their performance. It incorporates both explicit and tacit knowledge. (The former is "prescribeable" knowledge, typical to formal job descriptions, that can be described to others; the latter is something we "know but cannot tell," such as that often found among various kinds of professionals and skilled workers.)
- c. Knowing whom: This refers to those with whom we work or with whom we have a relationship that somehow affects the way we work. It builds on the contacts and relationships that people develop with others, in particular, networking. The ability to collaborate with present and past colleagues, acquaintances (e.g., university alumni), prominent leaders, businessmen, thinkers, or politicians can be crucial in making an impact. Mentoring is a different way of networking.

The three ways of knowing depict a systemic way of thinking about career investments. For each knowing type, people look for a return on the investments made. These ways of knowing are interdependent. Motivation and ambition to become a medical doctor (why) is likely to lead to pursuit of health education (how), as well as to the development of contacts and friendships with other medical staff (whom). These may or may not, in turn, reinforce (knowing why) identification with the field, which leads to further choices about new skill investments and new relationships (e.g., moving to alternative medicine).

The Protean Career

The idea of a protean career was first offered by Hall (1976) in the mid-1970s, but at the time had not captured the attention of career scholars or HR practitioners. Twenty years later, it was fully endorsed, as time was ripe and life realities reflected the phenomenon. The protean career is a new career form in which the individual, rather than the organization, takes on the responsibility of transforming career path—takes on the responsibility for career. Moreover, the individual changes himself or herself according to needs. The term *protean* comes from the name of the Greek god Proteus, who could change his shape at will. Hall and Moss (1998) described the protean career as a process that the person, not the organization, is managing. This process consists of the totality of the person's varied experience in education, training, work in several organizations, changes in occupational field, and so forth. The protean person's own personal career choices and search for self-fulfillment are the unifying or integrative elements in their life. The major characteristics of the protean career are as follows:

- 1. The person, not the organization, manages the career.
- 2. The career is a lifelong series of experiences, skills, learning, transitions, and identity changes. ("Career age," not chronological age counts.)
- 3. Development is
 - · continuous learning,
 - self-directed,
 - · relational, and
 - found in work challenges.
- 4. Development is not (necessarily)
 - · formal training,
 - · retraining, or
 - upward mobility.
- 5. The ingredients for success change
 - from know-how to learn-how,
 - · from job security to employability,
 - · from organizational careers to protean careers, and
 - from "work self" to "whole self."
- 6. The organization provides
 - · challenging assignments,
 - · developmental relationships, and
 - information and other developmental resources
- 7. The goal is psychological success.

The protean career is the contract between one and oneself, rather than a contract with the organization. It is not restricted to the realm of paid work or of work/nonwork domains. The protean concept alters the relationship between the organization and the employee. The person takes on the role of his or her own agent, instead of leaving it for the organization. In the protean career realm, people will have several careers, and each will have the inner stages of exploration, trial, establishment, and mastery. Reaching mastery will not necessitate stability but, rather, may lead to a new cycle of exploration that ends with the discovery of a new path or a different profession, role, or organization. In practice, when millions of jobs are lost across the industrial world, mostly from large firms, the individual has no other option but to take the responsibility to manage one's own career and, at best, to make good use of organizational support mechanisms and career facilities.

The Postcorporate Career

Peiperl and Baruch's (1997) postcorporate career is one example of the next leap forward in career horizons, now legitimately spread outside the organization. They claim that many people faced with slimmer prospects for advancement have become disillusioned with careers in large organizations. Thus, work and careers are moving out of these organizations altogether, into smaller, more entrepreneurial firms and into individual, consultant-type roles. To a certain extent, this represents a cycle where models of careers and career systems have evolved. Organizations become agile, changing form and features, and individuals can opt for a variety of career configurations unavailable in the earlier organization man era.

Career Stages Models

The traditional career stages model offered a typical growth path. Such were Super (1957) and Schein's (1978) career stage models, offering a specific number of stages and allocating specific age ranges for each stage. For example, eight stages of Schein (1978) are the following: (a) growth and search (0–21), (b) entry to work world (16–25), (c) basic training (16–25), (d) starting full-time career (17–30), (e) midcareer (25+), (f) late career (40+), (g) decline (40+), and (h) retirement.

These models fit the traditional, ideal type of career but not the emerging, new career model. Further, they did not accommodate diversity issues, in particular, gender difference: Many females had a career break that took them off this track. The models also did not fit for people having a second career and ignored vocational segregation. To answer the last issue, Dalton, Thompson, and Price's (1977) model focused on professional growth and managerial development and, thus, is a better fit for professionals. They suggested a four-stage model of career development, in which a career can be conceptualized as a progression

through developmental stages that are independent of organizational structure or hierarchy. In the first stage, individuals serve as apprentices, learning to perform and benefiting from more experienced mentors. During the second stage, they have developed specific competence and start to perform and demonstrate their own initiative and creativity. By the time they reach the third stage, they may become mentors to others and have broadened their interests by contributing through others. In the fourth and last stage, the individuals have been able to shape the practices, policies, and even the culture and direction of the entire organization. They guide and represent the organization (e.g., as a top manager or an expert). One should bear in mind, though, that not all would be able to develop into the third stage, and even fewer would reach the fourth.

Baruch (2004) offered an integrated model, which has neither a definite number of stages nor specific age boundaries. It, nevertheless, encompasses and captures the common nature and notion of the various career stage models and allows for a redefinition and regeneration of career change and renewal. The stages and their meaning are as follows:

- Foundation: Childhood, adolescence, experience, and education, which help in planting the seeds of future career aspiration
- b. Career entry: Usually through attainment of profession.
 This may be done via apprenticeship, on-the-job training, or formal education, such as attending college, university, or other professional qualifications
- c. Advancement: A stage that comprises both professional and hierarchical development within organization(s) or when expanding one's own business. This stage can be characterized with either continuous advancement or progress up to a stage of reaching a plateau. In today's career environment and concepts, this stage will typically be associated with several changes of employer
- d. Reevaluation: Checking the match between aspiration and fulfillment and rethinking job/role/career. This stage can emerge from an internal feeling or need (e.g., getting bored due to lack of challenge, life crisis) or external force (redundancy, obsolescence of the profession) and might end with a decision to keep on the same path or to change career direction, returning to stage (b)
- e. Reinforcement: After making the decision, a reinforcement of present career or returning to the learning stage (b) for establishment of a new career
- f. Decline: Save for the few who have a full life of continuous advancement, most will start, at a certain stage, to envisage a withdrawal from working life, which can be swift or long term, spreading over few years
- g. Retirement: Leaving the labor market (not necessarily at the formal retirement age).

While this model is composed of seven stages, the stages marked (b) to (e) can and, in most cases, will run several cycles. Some may involve a change of organization, occupation, vocation, and mode of work (e.g., move to part-time and then back to full-time employment).

Seven Career Strategies

Greenhaus, Callanan, and Godshalk (2000) offered a framework to analyze the strategies that people utilize to enhance their careers and reach further development and progress. While this framework is U.S. biased (i.e., in other countries, different strategies will have different relevance or impact), it is fairly comprehensive. They listed the following:

- a. Competence in current job: This strategy emphasizes efficiency and effectiveness in job performance. A person who gets results will be successful, receive promotions, and gain more income. The practice of performance-related payment is based on this concept.
 - It is clear that delivering results will be a prerequisite for promotion and success, but it is not necessarily sufficient in many cases. Such a strategy will certainly help in the lower echelons, but later will have to gain support from further strategies.
- b. Extended work involvement: Investments in the job such as energy, long working hours, and emotions show commitment and loyalty to the organization or the project, can improve performance, and may help in getting better career results. Such a strategy, warned Greenhaus et al. (2000), may backfire as a person might lose life balance.
- c. Skill development: This strategy focuses on acquiring new skills, competencies, and abilities, thus enhancing the know-how component of the intelligent career. Again, this is an indirect way to gain improvement on job performance, as well as generating a portfolio that will enable gaining further appointment (i.e., for jobs that require certain knowledge, skills, and qualifications).
- d. Opportunity development: This is a set of strategies designed to increase career options, mostly concerned with creating contact with organizational decision makers. Such strategies can be visibility (being able to approach top management and, thus, gaining understanding of the requirements for promotion) and exposure (being seen by top management and, thus, gaining recognition and sponsorship.
- e. Development of mentor and other supportive alliances: Finding (or having the organization appointing for you) a mentor can be a great career move—as long as the mentor is indeed successful in both coaching and promoting the protégé. Such relationships can be beneficial to the mentor, too, but contain some risk for both individuals and organizations if the relationship does not develop in the right direction.

- f. Image building: This strategy requires individuals to convey an image and reputation of success through external public relations and appearance. This strategy resembles the idea of career signaling and impression management.
- g. Organizational politics: This strategy requires individuals to be very positive toward bosses and organizational representation. This can take the form of flattering, supporting organizational policy and practice, and standing behind organizational rules rather than complaining. Forming coalitions and cliques as part of opportunistic networking is also political. An example for the extreme opposite for such approach is whistle-blowing.

Career Resilience

Career resilience is the ability to survive and strive in a labor market that is dynamic and fragmented, as characterized in the postcorporate career model. The concept was introduced by London (1983) in the 1980s and was widely recognized following Waterman and Collard's work (1994). Career resilience is congruent with the many definitions of professional practice that include autonomy, self-direction, and continuous learning. Specific characteristics of career-resilient individuals and, hence, integral foci of a career planning and development program, include professional autonomy, competence, and self-efficacy. People can be agile in determining their future, and employability is perhaps the most crucial ingredient of career resilience.

Multidirectional Career

Career is a major life constituency; it evolves around work, and work provides sense of purpose, challenge, selffulfillment, and, of course, income. Moreover, work is a source of identity, creativity, and life challenge, as well as status and access to social networking. Overall, one can see career as a life journey. Building on the metaphor of a life journey, people can opt to take the beaten path or to navigate their way in the open plains. Indeed, in the past, the "beaten," linear path was acceptable, and very few rebelled. The overall changes in society and the world of work depicted earlier in this chapter paved the way to a new realm where multidirectional career paths exist and both individuals and society positively consider them. Careers became transitional and flexible, and the dynamics of the restructuring blur the tidy and firm former routes for success (forcing new perspective of what is success). The new models of careers are composed of a variety of options and many possible directions of development. People experience different ways for defining career success: They can be sideways moves or changes of direction, organization, or aspiration. People can (or have to) choose from these options, and there is no single way for reaching success, hence the term suggested by Baruch (2004a), multidirectional career paths. The multidirectionality does not stop at the actual career path undertaken, but it also implies the evaluation of career success: We now have multioptions criteria for assessing success in career. These can be inner satisfaction, life balance, autonomy and freedom, and other measures of self-perception. All of these have entered the formula, alongside the traditional external measures of income, rank, and status.

Employability and Career Proactivity

In this new career landscape, people need to gain employability rather than secure employment. Employers can no longer provide secure jobs and stopped pretending that such a commitment is manageable; instead, they can help employees to improve their competence and ability to acquire employment in case they become redundant or just decide to move on. Career resilience, intelligence, and employability are the new essential survival tools in the struggle to endure the change. To be successful, people need to plan and be proactive in their pursuit of happiness in life and work. Taking the initiative was transferred to individuals, and to be successful they need to take advantage of their competence and reach for their goals. They use the organization rather than letting the organization play with them as chess pieces on the board.

The Kaleidoscope Career Model

Not everyone wants to climb to the top of the corporate ladder anymore. A survey of Fortune 1000 senior executives found that 60% had no desire to hold a top position in any company (Mainiero & Sherry, 2007). Instead, many individuals are choosing varied career paths, which change over the course of their lives. People take breaks from the workforce because of family demands or the need to engage in personal development. Individuals increasingly take control of their own career management and define success subjectively, on their own terms, beyond measures of salary and promotion rates.

In their opt-out revolt, Mainiero and Sullivan (2007) found that today's workers had created kaleidoscope careers, which are careers that were not defined by a corporation but by the individual worker, based on his/her own values and life choices. Like a kaleidoscope, the careers of these individuals are dynamic and in motion; as people's lives change, they alter their careers to adjust to these changes rather than follow company career norms. They developed the kaleidoscope career model (KCM) as the result of an in-depth investigation into the complex issues surrounding today's workers' choices regarding career, family, and nonwork aspects of life. Their research brought the complexities of careers, family, and lifestyle issues to the forefront. While many people remain in jobs that require them to put in the standard 40-60 hours or more of work per week at their offices, a refreshing change occurred in the way in which many others accomplished their work. Rather than being nakedly ambitious and focusing on climbing

the corporate ladder, many individuals created careers on their own terms. They were searching for the best set of options that created the maximum fit between their work, family, and personal lives. They had created kaleidoscope careers—careers defined not by corporate standards but by their own values and life choices.

The kaleidoscope career model permits employees to shift and rearrange their roles and relationships in new ways. Consider the working of a kaleidoscope; as one part moves, the other parts also change. Like a kaleidoscope that produces changing patterns when the tube rotates and its glass chips fall into new arrangements, workers shift the pattern of their careers by rotating different aspects of their lives. Employees may evaluate the choices and options available through the lens of the kaleidoscope to determine the best fit among their many relationships, work constraints, and opportunities. As one decision is made, it affects the outcome of the kaleidoscope pattern. Like a kaleidoscope, individuals' careers are dynamic and in motion such that they are able to alter their career priorities to adjust to the needs of their families, rather than letting corporations dictate their careers for them.

Just as a kaleidoscope uses three mirrors to create infinite patterns, the kaleidoscope career model has three "mirrors," or parameters (authenticity, balance, and challenge), which combine in different ways throughout the lives of individuals and reflect the unique patterns of their careers. Each of these parameters, or decision-making questions, acts as a signpost throughout the career. Certain parameters predominate at different points in the life span, forcing decisions about opting out of or staying in the workforce.

Over the course of an individual's life, the need for authenticity, balance, and challenge (the "ABCs of the kaleidoscope career model") shifted and rearranged itself in response to life and career choices. But what exactly does each of these parameters represent? Consider the following descriptions.

The Need for Authenticity. Authenticity is the parameter that describes being genuine and true to oneself, knowing one's strengths and limitations, and acting on the best information at the time. The need for authenticity is the quest to discover one's true voice. For men and women, discussions about bad bosses, lack of advancement, bringing children to basketball games, and the continual demands of child care and elder care often drowned out this need. This was the voice of individuals as they reflected upon their choices, however, and asked, Did I make the right decision? Does this decision make sense for me as well as for others around me? Does the decision truly reflect who I am?

The Need for Balance. The need for balance is defined as bringing work and nonwork factors into a state of equilibrium. Balance is a nexus issue for people as the demands of their work outstripped the time available to spend with family or for themselves.

The Need for Challenge. This parameter reflects a worker's need to learn, grow, and find stimulating, exciting work. The challenge of new product innovations, defining a new

entrepreneurial enterprise, partaking in a "stretch" work assignment, championing a cause, or bringing changes to a company is a key motivation and driving force in current careers.

Challenge is the voltage of work achievement. When people are challenged in their work, they do not mind putting in the extra hours that are required to get the job done right. Challenge springs from the underlying source of creativity and drive that exists within each individual and spurs the accomplishment of great things. Challenge can be a powerful motivator. For some people it is a validation of who they are or a way to learn and grow. For others it is a way to develop a base of expertise. Most of the men and women in Mainiero and Sullivan's (2007) study focused on challenges early in their careers, before the demands of family became overwhelming.

Career Anchors

Career anchors are the perceived abilities, values, attitudes, and motives people have, which determine their career aspiration and direction. These self-perceived talents and qualities serve to guide, constrain, stabilize, reinforce, and develop people's careers. Edgar Schein (1978) suggested the idea of career anchors and updated this idea in his later work. One should bear in mind, however, that in many instances, the actual career path people follow does not necessarily derive from their initial aspirations; chance event, society pressure, and other influences may cause people to progress in careers that are not rooted in their true anchors.

The concept itself and, in particular, its constituencies—the anchors—have developed across time. Schein originally suggested five anchors in the 1970s, based on a sample of MBA graduates of MIT. The number of career anchors Schein suggested rose to eight by the 1980s. The original five are as follows:

- · Technical competencies
- · Managerial competencies
- · Security and stability
- Entrepreneurial/creativity
- · Autonomy/independence

The additional three follow:

- Dedication to a cause (e.g., service)
- · Pure challenge
- · Lifestyle

New anchors emerged toward the 21st century and may be added to the framework. Some of them may even replace some of the original anchors. Among these Baruch (2004b) counts employability, work versus family balance, and spiritual purpose.

Caveat 1: The Need for a Balanced Approach. Much of the earlier discussion of contemporary literature on business in general and on careers' specific, related issues emphasized the dynamic nature of labor markets. The impression portrayed by the scholarly community is that in the past, organizations had a rigid hierarchical structure and operated within a stable environment. As a result, careers were predictable, secure, and linear. In contrast, the organizational system has moved to a mode of "all change," all dynamic, and total fluidity. Careers became unpredictable, vulnerable, and multidirectional.

Depictions of both past and present states offer extreme scenarios, which may not reflect a true and fair representation of the actual affair of careers. On the one hand, while many have shifted from the traditional and conventional mode, many organizations still perform within a relatively stable environment and apply well-established strategies for their management, keeping much of the traditional system; on the other hand, even within the traditional mode, careers were not fully rigid.

Realistic perspective will acknowledge that contemporary organizations are less rigid, though not fully fluid; that control may not reside solely with the organization, but that this shift does not mean that the organization has abandoned its role in career management; that individuals take more control of their own careers, but that much remains for organizations to plan and manage; and that careers can be seen as successful based on internal feelings, but that moving up the hierarchy ladder (that can be flatter), high earnings, and gaining status and power are, nevertheless, determining factors of success for people. These are indicators of external career success, in contrast to internal career success, which reflects the inner feelings of well being and satisfaction from what people do in their roles and their life.

Caveat 2: The Role of the Organization. Individuals need to find organizations that fit for them, and organizations have much to do in planning and managing careers (see Inkson's entry in this handbook). For example, Higgins defines career imprinting as the "capabilities, connections, confidence and cognition that groups of people develop as a result of a common set of career experiences in a particular organization" (Higgins, 2005, p. 4). The organization remains a significant player and is still the most dominant landscape for career journeys.

METHODS

Studying Careers

To study careers, scholars employ a variety of research methods. This is due, in part, to the fact that no single methodological approach can provide a full and comprehensive view of such a wide phenomenon. For example, some advocate the use of a quantitative, positivist approach whereas others support qualitative analysis. Both can highlight different aspects in career theory and practice. To this general methodology issue, one should bear in mind that career, as a field, is not the property of any single theoretical or

disciplinary view. Different scholarly fields are concerned when studying careers: psychology, social psychology, sociology, statistics, anthropology, economics, political science, history, geography, environment, and law, to mention the prominent ones. Most of these (though not all) reside within the boundaries of behavioral science.

This is why the study of careers is not restricted to a single mode of investigation and exploration. Indeed, academic journals that publish in the career area encourage a variety of research methods (see, e.g., *Journal of Vocational Behavior, Career Development International, Career Development Quarterly*, and the wider HRM journals such as *Human Resource Management, International Journal of Human Resource Management, Personnel Review*, and a number of others).

IMPLICATIONS

For Individuals

The major implication for individuals is that your career is up to you. Much is left for you to plan, initiate, manage, and monitor in your career progress. A clear shift has occurred in the relationships and the balance of power in planning and managing careers, and it has moved to the individual. The choice let for people is to become their own career agents.

For Organizations

The reader will find much input on the way organizations adapted to the new shape of careers in the entry to this volume by Kerr Inkson. In the past, the organization had the power in a culture of command and control. People strived to climb the organizational ladder, and the picture was clear, linear, and structured. It should be noted that while the changes described here have substantially changed this model of careers, much is still progressing in traditional systems. No full revolution occurred; the new structure and ways of careers emerged to exist alongside the traditional model. And, yes, the new developments influenced the traditional model. More choices exist and more decisions need to be made at both organizational and individual levels.

Global Career

One characteristic of current careers is that more of them have become global, and the geographical boundaries are amongst those boundaries that became blurred. The classical model of global careers was that of the organization expanding across borders and has to deal with two basic issues: first, how to keep and maintain a unified career system across the operational units in different countries and second, how to manage expatriation and repatriation processes.

The first one has changed from a single model of global expatriation to multiple options for individuals and organizations to handle it. Some global enterprises have a well-tested, operational system to attract, manage, and retain expatriates. It seems, however, that much is shifting here, too, allowing individuals to initiate and manage their career stage of expatriation. We witness a move from organization-induced to individual-oriented global career. People choose to be expatriated and offer it in a proactive way when they see it would benefit their future career, either within their present employer boundaries or beyond.

SUMMARY

This entry presented the past, present, and future of careers from the individual point of view. It described and critically analyzed a number of contemporary career models to show the shift of power and responsibility, which has gradually moved from the organization to the individual.

In this chapter, I defined, compared, and contrasted several career perspectives. In particular, I examined the individual versus the organization, the balance between them, and the environment in which they take place. Specific focus was devoted to the changing nature of careers, employment relationships, and the new psychological contract. This entry summarized the concept of career as perceived from the individual perspective. It covered several aspects and directions for understanding new careers—in particular, career choice, career stages, and the role personality plays in making career choice and interpreting careers.

REFERENCES AND FURTHER READINGS

- Arthur, M. B., Claman, P. H., & DeFillippi, R. J. (1995). Intelligent enterprise, intelligent careers, *Academy of Management Executive*, 9(4), 7–22.
- Arthur, M. B., Hall, D. T., & Lawrence, B. S. (Eds.). (1989).
 Handbook of career theory. Cambridge, UK: Cambridge University Press.
- Baruch, Y. (2004a). Transforming careers—From linear to multidirectional career paths: Organizational and individual perspective. *Career Development International*, 9(1), 58–73.
- Baruch, Y. (2004b). *Managing careers: Theory and practice*. Harlow, UK: FT-Prentice Hall/Pearson.
- Baruch, Y., & Hind, P. (1999). Perpetual motion in organizations: Effective management and the impact of the new psychological contracts on 'Survivor Syndrome'. *European Journal of Work and Organizational Psychology*, 8(2), 295–306.
- Brockner, J., Grover, S., Reed, T. F., & DeWitt, R. L. (1992). Layoffs, job insecurity, and survivors' work effort: Evidence of an inverted-U relationship. *Academy of Management Journal*, *35*(2), 413–425.
- Dalton, G., Thompson, P., & Price, P. (1977). The four stages of professional careers: A new look at performance by professionals. *Organizational Dynamics*, 6(1), 23.

- Derr, B. C. (1986). Managing the new careerists: The diverse career success orientation of today's workers. San Francisco: Jossey-Bass.
- Greenhaus, J. H., & Callanan, G. A. (Eds.). (2006). *Encyclopedia of career development*. Thousand Oaks, CA: Sage.
- Greenhaus, J. H. Callanan, G. A., & Godshalk, V. M. (2000). *Career management* (3rd ed.). Fort Worth, TX: Dryden.
- Hall, D. T. (1976). *Careers in organizations*. Glenview, IL: Scott. Hall, D. T. (2002). *Careers in and out of organizations*. Thousand
- Oaks, CA: Sage.
- Hall, D. T. & Moss, J. E. (1998). The new protean career contract: Helping organizations and employees adapt. *Organizational Dynamics*, 26(3), 22–37.
- Herriot, P., & Pemberton, C. (1996). Contracting careers. *Human Relations*, 49(6), 757–790.
- Higgins, M. (2005). Career imprints. San Francisco: Jossey-Bass.
- Hughes, E. C. (1937). Institutional office and the person. *American Journal of Sociology*, 43(3), 404–413.
- Inkson, K. (2007). *Understanding careers: The metaphors of working lives*. Thousand Oaks, CA: Sage.

- London, M. (1983). Toward a theory of career motivation. *The Academy of Management Review*, 8(4), 620–630.
- Mainiero, L. A., & Sullivan, S. E. (2007). *The opt-out revolt: Why people are leaving companies to create kaleidoscope careers*. Mountain View, CA: Davies-Black Publishing.
- Peiperl, M. A. & Baruch, Y. (1997). Back to square zero: The post-corporate career. *Organizational Dynamics*, 25(4), 7–22.
- Rousseau, D. M. (1995). *Psychological contracts in organizations*, Thousand Oaks, CA: Sage.
- Schein, E. H. (1978). Career dynamics: Matching individual and organizational needs. Reading, MA: Addison-Wesley.
- Sullivan, S. E. (1999). The changing nature of careers: A review and research agenda. *Journal of Management*, 25(3), 457–484.
- Super, D. E. (1957). *The psychology of careers*. New York: Harper & Row.
- Waterman, R. H., Jr, Waterman, J. A., & Collard, B. A. (1994). Toward a career-resilient workforce, *Harvard Business Review*, 72(4), 87–95.
- Whyte, W. H. (1956). *The organization man*. New York: Simon & Shuster.

THE CHANGING NATURE OF MID- AND LATE CAREERS

KENNETH S. SHULTZ

California State University, San Bernardino

Mo Wang

Portland State University

large body of work on young adults' transition from school to work and the establishment phase of their careers can be found in the extensive literature on occupational careers. However, relatively little empirical and theoretical work exists on the unique career issues faced by those workers in their mid- to late career stages, particularly with regard to the psychosocial dynamics of mid- and late careers. The need for additional work in this area is becoming more pressing with the shifting demographics to an older workforce, particularly the aging of the baby boom generation.

In addition, there has been a move away from the traditional linear career progression that was dictated primarily by the organization. This career progression focused on organizational-based rewards such as promotions and pension qualifications. More recently, protean-based careers, discussed by Hall and colleagues (e.g., Hall, 2004; Hall & Mirvis, 1995), which are controlled by the workers themselves and focused on their own personal values and goals, have become more prominent. Several authors have equated this new person-centered protean career model to the free agency market that has existed for a long time in professional sports. However, many mid- and late career workers who started their careers under the traditional model are not well prepared for the free agency market. Therefore, given

the shifting demographics to an older workforce as well as the shifting responsibility of career management to the workers themselves, the need for increased interest and research on the unique issues faced by mid- and late career workers is obviously warranted and clearly justifies the inclusion of this chapter in 21st Century Management.

In this chapter, the limited existing literature on mid- and late careers is reviewed and summarized. First, the various career theories espoused over the last century are briefly summarized, in particular with regard to how mid- and late career workers are portrayed. Next, a context for the need for further work in this growing area is presented by discussing the changing nature of work, workers, and the workforce in the 21st century. The numerous influences on mid- and late careers at the individual, job, and organizational levels are also discussed. Next, a brief discussion of the practical implications that the changing nature of midand late careers has for organizations and organizationalbased decision makers is provided. Future directions for mid- and late career theory and research are then presented. Finally, this chapter ends with a summary and conclusion section, a list of additional entries in this book that you may want to review or refer to, as well as a list of notable further readings for those readers wishing to gain more knowledge on this topic.

THE EVOLUTION OF CAREER THEORY

Sterns and colleagues (e.g., Sterns & Huyck, 2001; Sterns & Kaplan, 2003; Sterns & Sterns, 2005; Sterns & Subich, 2002) have noted in several of their writings that career theory has evolved dramatically over the last century from initially ignoring mid- and late career workers, to focusing on middle-aged and older workers only maintaining or exiting their careers, to more recently having a much greater appreciation with regard to the potential for continued growth at mid- and late career. The initial career models from the early 20th century focused exclusively on career exploration, entry, and establishment. Mid- and late career workers were essentially ignored. By the middle of the 20th century, theorists such as Super (1957) had proposed a fixed set of age-graded career stages that most workers were said to follow. For example, in Super's model the five stages included growth (ages 0-14), exploration (ages 15-24), establishment (ages 25-44), maintenance (ages 45-65), and decline (ages 65+) stages. Schein (1990) proposed a somewhat similar three-stage model of socialization, performance, and obsolescence versus development of new skills. Thus, mid- and late career workers were essentially relegated to working merely to maintain their career until they eventually became obsolete to the point of decline and disengagement in the form of retirement. Younger workers, on the other hand, moved about seeking their lot in life during the exploration stage and moved their way up the career ladder during the establishment, socialization, and performance stages. However, it should be noted that Super (1980) later revised his stage theory to acknowledge that the five stages may occur at different times in individuals' lives and may in fact occur several times throughout one's life as individuals change careers.

Other models during this time focused on establishing how well workers "fit" within a given organization or career path. For example, Holland (1985) wrote about the career congruence of workers. He talked about six finite work environments: realistic, investigative, artistic, social, enterprising, and conventional (hence, his well-known RI-ASEC model). His, and similar theorists, major contention was that to be successful in one's career there needed to be a match between one's primary personality and motives and one of the primary RIASEC work environments. While Holland's work focused primarily on career selection by young adults, it was implicitly assumed that middle-aged and older workers would only find happiness at work when their own personalities were properly matched with the corresponding work environment.

The 1970s represented a time of transition, when popular press authors such as Sheehy (1976) and Levinson (1978) began to question whether mid- and late careers were simply a time to maintain the status quo. Both authors helped to popularize the idea that midlife can in fact be a time of considerable transition and thus they helped to reshape both researchers' and societies' view of midlife career issues. In addition, they also began to question the use of the "White

male model" of career development for women and minorities, who often experience very different career patterns from White men.

More recent career models, such as the protean career model and the lifespan developmental model, that have evolved over the last quarter century, have a much greater appreciation for the continued potential for growth and renewal of workers in their mid- to late careers. These models also mark a clear move away from the traditional linear career progression, recognizing that most workers' careers, particularly today, do not follow a lockstep, linear, and agegraded path. Instead, these models acknowledge extensive individual differences in aging, which impact mid- and late career workers. The lifespan developmental model in particular puts forth the idea that individuals are influenced by a wide variety of factors, including biological and environmental influences that affect physical and cognitive aging, historical and generational events such as wars and economic depressions, as well as an assortment of unique individual factors and events that interact to determine an individual's unique career progression. Individuals are seen as beginning with different potentials in various characteristics and progressing at differing rates in their development. Thus, it is not surprising that workers who are the same age may be at vastly different points in their careers.

In order to fully understand and appreciate the lifespan developmental model of careers, we must understand the broader context in which careers occur. That is, we need to look at the nature of work and its evolution over time. In addition, we must also look at how workers and the workforce have evolved. Only in doing so will we be able to begin to understand the myriad of possible career trajectories that those in midlife and beyond may experience and fully appreciate the biological, psychological, sociological, and maturational influences on individuals' careers. Hence, we next examine the changing nature of work, workers, and the workforce in the 21st century.

The Changing Nature of Work, Workers, and the Workforce in the 21st Century

Most industrialized nations saw a dramatic shift from agricultural- and manufacturing-based economies to service-based economies over the course of the last century. In addition, some theorists, such as Drucker (2001), have suggested a further move to knowledge-based economies in the not-too-distant future. Because of these changes, the nature of the work that most individuals perform on a daily basis has dramatically changed as well. Specifically, the focus is shifting from reducing the physical demands on workers as they age to the cognitive and psychosocial demands, including job stress, which older workers are more likely to face in the 21st century workplace. The need for near constant (re)training and the explosion of technology are just two examples of the changing nature of the 21st century workplace.

In addition, the workforce itself is dramatically changing. Within the next decade, the workforce over age 50 is

predicted to grow at a rate almost four times that of the workforce as a whole. Thus, it is clear that mid- and late career workers will make up a continually larger portion of the workforce in the 21st century. In addition, the future workforce will also be more ethnically, culturally, and gender diverse than ever before. Global competition and continued outsourcing and off-shoring of jobs will also dramatically affect the makeup of the 21st century workforce. Thus, the question becomes, how will these changes affect the nature of mid- and late careers for middle-aged and older workers?

CAREER ISSUES UNIQUE TO MID- AND LATE CAREER WORKERS

A variety of unique issues face mid-career workers. In fact, early mid-career workers may face different issues than late mid-career and late career workers. For example, early mid-career workers will most likely assess their career progress to determine whether job or career changes may be necessary to meet their desired goals. In addition, early career workers are also likely facing changing work and family balance demands. Their children are becoming more independent, while aging parents may be becoming more dependent. Job and career "embeddedness" factors (i.e, those things that keep us in a particular job or career) such as spousal employment, children's schooling, job satisfaction and attachment, and social relationships at work are also likely to be different for those in early mid-career versus those in late mid-career or late career.

Meanwhile, those approaching late career may be wondering how much effort and ambition to invest as they are near the end of their career. These older workers will also likely be more focused on preparing for the transition to reduced work roles, through either complete retirement or some form of phased or bridged retirement. They may also be thinking about their legacy at work and to their profession, and as a result may be more interested in mentoring. This is a concept that the developmental psychologist Erik Erikson referred to as the generativity factor that many older adults experience. Thus, we next examine the wide variety of unique factors that impact midlife and older workers at the individual, job, and organizational levels.

Individual-Level Factors

Mid- and late career workers face a variety of physical and psychosocial changes that could impact their careers. Among the most salient are physical aging, cognitive aging, experience and expertise, and work-family balance.

Impact of Physical Aging

Research has shown that as age increases there is a general trend toward decreasing energy, and, as a result, reduced capacity for physically demanding tasks. The implication of this, obviously, is that age-related physical changes may make it more difficult for older employees to perform physically demanding tasks. As such, occupations that require workers to perform very quickly or that require workers to perform physically demanding activities for long periods are generally less attractive as mid- and late career options.

Further, physical aging may make older employees more vulnerable to occupational hazards, as physical aging is generally intertwined with decreases in immune-system functioning and muscle strength. Typical occupations that may carry higher occupational safety and health risks for older employees include administrative support, production/craft/repair occupations, transportation and material moving, farming/forestry/fishing, private household services, and protective services. The risks are primarily in the areas of exposure to chemicals, being struck by heavy objects, exposure to violence, and repetitive motions. As such, these occupations are typically less attractive as midand late career options.

With physical aging, health care may become an important factor to consider for older workers who make mid- and late career decisions. Entering the 21st century, health-care costs have increased rapidly in the United States, as has the cost for health-insurance coverage. People who work for small businesses and who are self-employed usually have to pay more to get the same health benefit enjoyed by government or big corporate employees. Therefore, mid- and/or late career changes may function as a possible pathway to reach good-quality future health care. It should be noted that although the availability and quality of health care have been extensively discussed in general literature as well as in the popular media as factors that impact mid- and late career decision making, very few empirical studies in career change decision-making literature have examined these factors. Nevertheless, given the importance of health care to both older workers' physical and financial well-beings, its potential impact for older workers' mid- and late career change decisions should not be overlooked.

Impact of Cognitive Aging

When people grow older, even though their general knowledge remains stable or even increases, they tend to experience a reduction in cognitive resources. Specifically, cognitive aging features declines in processing speed, working memory, inhibition function, and sensations. These declines are the major reasons for age-related differences in cognitive performance. Given these declines, it may appear that older employees tend to have greater difficulty performing tasks that require retention of large amounts of information or that require rapid cognitive processing. This difficulty may be a major reason why people make careerpath changes in their mid- and late career stages. This is especially true for certain occupations. For example, air traffic controllers usually retire from their jobs when they are 45 due to the high cognitive demands of the job.

To deal with the difficulties resulting from cognitive aging, it is important for mid- and late career workers to receive training in order to take advantage of new technologies to assist their work. Often time, applications of new technology (e.g., enterprise resource planning systems) relieve workers from excessive information processing by organizing and automating routine productive processes, thereby decreasing the cognitive load imposed on workers.

Impact of Experience and Expertise

One thing that we know typically occurs as people age is that they gain experience and often have higher levels of task-related expertise. As one would probably imagine, experience is typically associated with higher levels of work performance. This makes mid- and late career workers quite attractive to employers, as hiring them saves considerable training cost and their performance is better than new job incumbents, at least initially. This is particularly true for today's workforce. Demographic projections have shown that by 2012, nearly 20% of the total U.S. workforce will be age 55 or older, up from just under 13% in 2000. With the pending retirement of the baby boomers, many analysts are predicting growing labor shortages. In fact, according to a recent research report provided by AARP, some employers are facing that problem now. In addition to the widely publicized shortages of nurses and other health-care professionals, organizations that rely on such specially trained individuals as teachers, engineers, and many other skilled workers are feeling the pressure of labor shortages. In light of the declining proportion of younger workers, older workers who engage in bridge employment can provide some beneficial labor market resources to overcome the growing labor shortages in the United States. Employers are more than ready to better utilize the productive powers and expertise of these experienced older workers.

Experience and expertise are also important when complex tasks are performed at work. Given the age-related cognitive changes described earlier, it would appear that older workers would tend to have greater difficulty performing cognitively demanding tasks. While it has been shown that older workers do have more difficulty performing such tasks, there have also been studies showing no age-related difference in the performance of these tasks. Scholars have suggested that older employees with higher levels of task-related expertise are able to develop strategies to compensate for their cognitive declines without impairing their task performance. As such, experience and expertise are particularly useful for mid- and late career workers to continue their careers without having to make a career path change or exit.

Impact of Work-Family Balance

Nowadays more and more couples enter the labor force at the same time, creating a large number of dual-earner families. When it comes to mid- and late career issues, considerable stress may develop in families where both husbands and wives have professional careers that are important to them—the so called dual-career family. In these families, husbands and wives who have given their career a high priority are likely to be well established in their careers by midadulthood. They probably have considerable responsibilities, may have to work long hours and take frequent business trips, and may need to relocate if they are to advance in their careers. Common career-related concerns of these families may occur on four levels: intrapersonal (identity and stress), interpersonal (competition and sharing tasks), organizational (work schedules, career interruptions, and advancement), and societal (lack of support and lack of role models). However, similarly, benefits of this lifestyle can be identified at the same four levels as well: intrapersonal (increased self-esteem and feelings of accomplishment), interpersonal (higher job satisfaction and intellectual compatibility), organizational (more resources and better benefits), and societal (legislative support and growing social acceptance). Indeed, compared to their husbands, wives from dual-career families in their mid-career bear more stress, as they are the ones who are expected by societal norms to keep a work-family balance. This has led to an increase in different career patterns for women, where they spend the first 10 or 15 years of adulthood focusing on their career and then cutting back or stepping out of the workforce temporarily sometime around their mid- to late 30s to have a child before it is too late.

Another work-family related issue that features the particular need of work-family balance is care giving responsibility. In today's workforce, the number of workers who are caring for family members at both ends of the life span—children and elders—is growing quite rapidly. These employees are called "the sandwich generation." Several social and demographic trends have contributed to the phenomenon of the sandwich generation in the United States, including delayed childbearing, the aging of the American population, the aging of the American workforce, the increasing number of women in the workforce, decreases in family size and changes in family composition, and rising health-care costs. Neal and Hammer's (2007) research has shown that similar to dual-career families, wives in the sandwich generation perceive more family-to-work conflict than their husbands do. Further, they found that members from the sandwich generation preferred jobs that allow flexibility either in one's daily work schedule or in location in order to be able to provide family care. Moreover, members from the sandwich generation also preferred working for organizations that have family-friendly workplace policies for them to attend to their family-care needs. Given that the typical age of members of the sandwich generation ranges from 35 to 50, these preferences in terms of jobs and organizations are likely to substantially influence these employees' mid- and late career-related decisions.

Job-Level Factors

The nature of work itself is also changing. While some jobs are still very physically demanding, overall, jobs are

becoming less physically demanding and more cognitively demanding. As a result, many workers worry more about keeping up with technology and interpersonal demands at work, as opposed to the physical demands of the job. In addition, issues such as job stress, boredom, obsolescence, and increasing technology demands can all push older workers to seek new employment at middle age. However, as just noted, middle-aged workers are also more likely to be embedded in both their job and career, thus making it less likely that they will change jobs or careers at this point in their work life. Next, we discuss several job-level factors that may impact mid- and late careers.

Impact of Job Characteristics and Stressors

Jobs differ considerably on a number of dimensions, including autonomy, task identity, task significance, feedback process, and required skill variety. In addition, some jobs have higher levels of stressors than others do. All these factors embedded in one's job are likely to influence one's mid- and late career path. For example, when the required skill variety to perform the job is high, older workers may have problems in keeping up with new technologies. As such, people who perform this type of job may be more likely to choose to retire early or to switch to a career where constant skill updates are not required. Previous research has also shown that workers in their mid- and late careers generally prefer working alone and having greater autonomy in job-related decision making. Therefore, a job with low autonomy may lead older workers to seek new employment opportunities that allow for greater autonomy.

Further, workers may respond to specific job stressors differently depending on the stage of their career. One such stressor is job insecurity. Since older employees stand to lose much more financially if laid off and may have limited prospects for reemployment as compared to younger employees, they may exhibit more negative psychological reactions to job insecurity. Previous studies have also found that older employees responded more negatively to role conflict compared to younger employees. The fact that role conflict was more bothersome to older workers was possibly because balancing these conflicts may have required higher levels of cognitive or physical resources than older employees possessed. Overall, mid- and late career workers may engage in active job searching or directly entering retirement in reacting to these stressors.

Impact of Job Satisfaction

Numerous studies have shown that age is associated with increasingly positive job satisfaction. This positive relationship may be due to the covariation of age with job circumstances that produce job satisfaction. For example, a number of variables that are also associated with job satisfaction, such as work experience, organizational tenure, job level, and income tend to be correlated with age. Older

workers typically have longer tenure and more work experience and have advanced to higher occupational levels providing them with jobs that offer many of the outcomes that contribute to increased job satisfaction. The positive relationship between age and job satisfaction may also be due to the systematic changes in the central life interests and emotional functioning of adults that unfold as workers age. For example, older workers may report more satisfaction with their jobs because they have mellowed with time. Further, it has been suggested that aging is associated with a gradual lowering of expectations and aspirations. As such, as workers age, they adjust their standards from overly idealistic to more realistic. This allows older workers to be sufficiently satisfied with situations that would not have been satisfying at an earlier point in their careers.

The overall implication of this positive relationship between age and job satisfaction for mid- and late career development are twofold. First, it indicates that the older the workers are, the less likely that they will make career changes due to job dissatisfaction unless they approach the window of time when retirement becomes a socially acceptable and an economically viable alternative. If that is the case, they will probably transition to retirement. Second, if job satisfaction is generally achieved in mid- and late careers, it should facilitate the possibility of bridge employment in the same career field. This way, more accumulated job knowledge and expertise will be retained in the labor force and will help to address the growing labor shortages in the United States as previously discussed.

Organizational-Level Factors

Unlike the military sector where clear "up-or-out" criteria for promotions, and hence career success, still exist, such steadfast demarcations appear to be fading in the civilian sector. Age norms regarding the expected level of career achievement that should be attained by a certain age, while still evident in some professions, are beginning to be questioned with regard to their influence on actual behavior. In addition, most workers no longer follow the stereotype of a long and stable career with one or two employers, followed by retirement. Instead, we see a much wider set of acceptable transitions from early to mid- to late career and eventually into retirement.

Career mobility and career stability are also key factors for workers in their mid- and late careers, as noted by Feldman (2007). Middle-aged and older workers tend to have more stability in both their personal and work lives. As a result, they are less likely to change jobs or careers than younger workers are. Organizational level factors such as perceived age bias and discrimination and organizational downsizings and declines in the demand for certain types of labor are also likely to influence workers' desire to change their job or career at later ages. Thus, we briefly review the importance of both organizational climate and downsizings on mid- and late career development.

Impact of Organizational Climate

Organizational climate has received a great deal of recent attention in organizational research, although the trend has been to examine climate with respect to specific organizational domains. For the purposes of this chapter, however, the most relevant form of climate is simply the organizational climate with regard to older employees. Is the organizational climate such that older employees are treated with respect and dignity or are they simply cast aside? Does the organization value the experience and wisdom of older employees? Is the organization willing to make adjustments in jobs when older employees reach a point when they may not be able to perform their job as fast as younger employees? While research has not yet examined these questions in depth, we believe that organizational climates likely differ in this regard and that such differences affect mid- and late career workers. It is possible, for example, that such climate differences impact the self-perceived value that individuals have of themselves as organizational members acting within an organizational context—so called "organizational-based self-esteem" (OBSE). When the organizational climate toward older employees is negative, this may lead older employees to have low levels of OBSE. In such situation, older workers are more likely to retire or change jobs in order to preserve their self-concept.

Impact of Organizational Downsizings and Declines in Demand for Certain Types of Labor

Perhaps the most visible sign of career turbulence in the late 20th century was the heightened loss of jobs. It has been estimated that 43 million jobs were lost in the United States between 1979 and 1995. Moreover, the pace of job loss accelerated in the 1990s, with 3.2 million jobs lost per year on average—an increase of nearly 40% over the 1980s. This extensive job loss has been attributed to technological advances that render many jobs obsolete. The pursuit of increased efficiency in an intensively competitive global economy has also led to the rising rate of organizational downsizing through mergers, acquisitions, and the relocation of manufacturing bases.

In addition, many organizations have changed their structure and their human resources practices in significant ways. It has been suggested that an increasing number of employers will be characterized by a small, permanent core workforce supplemented by a larger number of contingent, part-time, and contract workers. As such, one resulting trend of the organizational downsizing is that the number of traditional White-collar jobs available in the labor market has significantly decreased and has been largely replaced by hourly service work positions. Nevertheless, organizational downsizing may create a flatter hierarchy in the organization with self-managed, cross-functional teams responsible for most decisions and may provide op-

portunities to eliminate unprofitable ventures and seek more promising enterprises.

Given the organizational downsizings and declines in demand of traditional White-collar jobs, older workers who entered mid- or late careers during this time may have fewer career choices available. Further, while one is able to change career paths in mid- and late career, the possibility of trading up may be quite slim. However, mid- and late career workers who can function across different job roles, organizational hierarchies, and national boundaries may thrive in this business environment, because they fit to the exact need for substantial speed and flexibility to respond to intensely competitive market forces produced by the global economy.

THE TRANSITION TO RETIREMENT

As Greller and Simpson (1999) note, "One could not reasonably look at late career without examining the literature on retirement. Retirement may be viewed as either the end of late career or an integral part of it" (p. 325). After reviewing the research in this area, Greller and Simpson later conclude, "For the broad population, a successful late career is the most likely prelude to a successful retirement. A frustrating, disrupted, and personally diminishing late career from which one was compelled to exit provides a poor basis for whatever may come next" (p. 328). Hence, how older workers conclude their late careers has significant implications for life after full time work. Thus, it is critical that we better understand what contributes to successful mid- and late careers if we wish to also improve the transition and adjustment to retirement.

As authors such as Beehr and Bowling (2002) have noted, the definition of what it means to be *retired* is a rapidly evolving concept. For example, traditionally it has been assumed that retirement meant that someone was no longer working for pay. However, many older workers now "retire" (sometimes referred to as early retirement) from a well-established career, only to transition into a reduced work role, to a different career, or possibly to a more traditional nonwork role as a retiree. The reduced but continuing work role is typically referred to as bridge employment, which most often consists of part-time and/or temporary work that may or may not be in the same career or line of work as that engaged in prior to "retirement." Unfortunately, the antecedents and consequences of engaging in bridge employment are not as well known.

While older workers typically begin transitioning out of the workforce by their late 50s to mid-60s, some individuals continue in their careers, or begin new careers, at this late age. Bronte (1993) conducted a qualitative, interviewbased study of individuals who had very long careers, well into their 80s and 90s, in order to determine the factors that lead to such unusual career longevity. Based on the many in-depth interviews she conducted with these elderly workers, she was able to classify the wide variety of career experiences into three broad career patterns. The first is those whom she called *homesteaders*. The homesteaders were those individuals who continued in the same job for their entire career. These were often in professional jobs such as scientists or artistic professions with extensive autonomy. They continued in their singular career primarily due to a high sense of engagement and a feeling that there was still potential for growth, even at their relatively old ages.

The second group was labeled the *transformers*. These individuals typically made one major job or career change either early in the exploration stage of their career or toward the end of a well-established career. This change afforded them the financial and personal stability to pursue other interests later in life. The third group of elderly workers was labeled *explorers*. These individuals had many career changes, with the reasons being quite varied. Thus, it is clear that it is possible to continue one's career, or start a new career, at a very late age if the individual is motivated, and the environmental and organizational conditions are amenable to doing so. Unfortunately, too often older workers are encouraged to leave their career, by both employers and their family and friends, before they may be ready, simply because it is what most people do.

However, recent survey research of baby boomers by organizations such as the AARP indicate that many older workers are interested in continuing work in some form once they retire from their "career jobs." Whether most would consider this the start of a new career is debatable, but should this desire to continue work past traditional retirement age come to fruition, it will clearly have a variety of interesting implications for employers to consider, which we explore next.

PRACTICAL IMPLICATIONS AND APPLICATIONS

Many practical implications are evident from the previous discussion for individuals, jobs, organizations, and the society. For individuals in midlife, an array of decisions must be made. Should one continue working at all once the traditional retirement age is reached? If so, in what form? Will it be possible to continue work, albeit in a reduced capacity, with his or her current employer? Should one seek out new organizations or even new careers? Of course, these decisions must be made in the context of the individual's family life. Moen and her colleagues (e.g., Kim & Moen, 2001; Moen, 1998; Moen, Kim, & Hofmeister, 2001) have shown that most couples try to time their retirement so that both spouses retire at or near the same time. However, family demands (e.g., children's college tuition costs or sickly elderly parents) can alter the best-laid plans.

Meanwhile organizations will be facing a slow-growing labor market, potentially unable to meet their labor demands. As a result, organizations will need to make some difficult decisions. Should they work to retain older workers? Should organizations provide incentives to keep older, more experienced workers from contemplating retirement? Should they develop mentoring programs to tap the wisdom of older workers who are quickly approaching retirement? Can jobs be restructured to make them more appealing and accommodating to middle-aged and older workers? Hence, choosing among these many options will be a major challenge for organizational decision makers in the 21st century.

Finally, society will also affect individuals' mid- and later career plans and experiences. A sudden downturn in the economy may force older workers to continue working beyond their desired retirement age or alter their plans to change careers late in life. In addition, many economists are predicting that Social Security and Medicare will soon be running a deficit. These issues are certainly going to impact older workers' plans for retirement.

Based on what we know about the changing nature of the workplace as well as family life, innovative programs have been developed in an effort to address and reduce the impact of some of these changes. The following list includes programs that particularly apply to mid- and late career workers:

- 1. Flexible-time schedules allow people to select their own work hours, thereby giving employees flexibility to attend to children and/or the elderly.
- Job-sharing programs allow hours and requirements to be divided between two people. These programs can be used to help create bridge-employment opportunities for employees transitioning into retirement.
- A cafeteria approach to benefits allows workers more freedom of choice of benefits, such as health insurance, life insurance, disability insurance, and retirement-investment plans.
- 4. Family-leave programs provide paid or unpaid time off for family issues, such as illness of one's spouse, child, or aging parents.
- 5. Educational programs help older workers better plan for and transition less abruptly into retirement.
- 6. Employee assistance programs (EAPs), including on-site or contractual counseling services, offer preventive and shortterm, problem-focused counseling. For example, through EAPs, organizations may offer services to older employees who are going through difficult transitions such as children moving out or the death of a spouse.
- 7. Early and phased retirement programs provide older workers with more time for trying new career directions.
- Partnership-building programs facilitated by the government among public universities, organizations, and older-worker advocacy groups (e.g., AARP) provide skill-enhancement training for older workers.

FUTURE DIRECTIONS FOR RESEARCH

While the previous discussion was based on the currently available literature, there is still relatively little empirical and theoretical work on the unique career issues faced by those workers in their mid- to late career stages. Therefore, much more research is still needed to examine the changing nature of mid- and late careers. We next discuss some directions that may be fruitful for future research.

First, future research should pay more attention to the differences among early mid-career workers, late mid-career workers, and late career workers. As we mentioned earlier, the motives for their careers as well as their career environment could be considerably different. Thus, multiple career-development and change patterns could exist among them. The value-based holistic model of career proposed by Brown (1996) is well suited to the study of this topic. This model argues that how people prioritize their values determines their choices of career and approaches for career development. Further, this model emphasizes that the prioritizing order of values changes over time depending on the person's developmental stage as well as the environmental factors, such as family demands and organizational attributes. According to this model, we can understand different career-development and change patterns at people's different career stages through examining their specific value systems at that time. Further, by acknowledging people's dynamic value systems, this model implies that both between-subjects and within-subjects differences will be observed in career choices at different career stages. Clarifying these differences is very important and will help in developing corresponding career counseling and intervention programs to improve workers' career choices, particularly during the latter stages of their career.

Second, much more research is needed to examine the impact of the growing multicultural workforce on mid- and late career issues. When there was more homogeneity, at least on the surface of our society, it was easier to believe that one pattern of career development or one theory of career could be right for everyone. However, our present multicultural population makes clear the importance of viewing people in their unique cultural context and background. Today about one third of new entrants to the labor force are people from minority backgrounds. Exploring their specific needs for career choice and development via understanding their cultural identities will facilitate both theory development and counseling practice in this field. It should also be noted that culture is quite a broad concept. Ethnicity is certainly not the only one that shapes people. The career choice and development of people with strong religious affiliations, people who are homosexual, people with disabilities, and people with substance-abuse problems are also likely to be affected by their unique experiences in their group.

Third, future research should also focus more on examining barriers to mid- and late career development. Although problems such as underemployment, stressful and even traumatic work experiences, sexual harassment, illiteracy, substance abuse, physical abuse, work incivility, poverty, and ethnic, age, and gender discriminations are often viewed by most as social problems, they are also barriers for successful career transition and development. Understanding how they interact with each other and affect one's career development in mid- or late career stages will help us paint a more comprehensive picture of mid- and late career development. For example, older workers who have experienced high stress on their preretirement jobs are more likely to directly retire than to engage in bridge-employment jobs. However, if they live in poverty, they may have to take postretirement jobs to make their living. This type of postretirement employment is certainly very different from the bridge employment that we usually discuss.

Fourth, future studies should also focus on investigating involuntary career changes in mid- and late career development. Although most occupational changes are made voluntarily, it is estimated that about 13% of changes are involuntary. People who lost their jobs are likely to have the most difficulty with the process of change as well as the least rewarding outcomes. It has been reported that 70% of voluntary career changes lead to higher income, whereas 70% of involuntary career changes lead to a decline in income. It has also been found that older workers, even with a college education, often spend longer (4–6 months) than average (2-3 months) to find a job. Therefore, mid- and late career workers seem to be at a disadvantage compared to early career workers when facing involuntary career changes. Nevertheless, the underlying mechanisms that manifest this disadvantage still need to be clarified. For example, is it because of the lack of skills, higher start-up salary, or the stereotype of lower performance? Mediational models need to be explicitly tested.

A final general suggestion we have for future research is to use multiple theoretical perspectives when examining mid- and late career change and development patterns. Although most theories used in this research area have received consistent empirical support, each of them may only provide valid hypotheses or explanations for a specific scope of subpopulations, relationships, or developmental trends. As we noted earlier, there are both between-subjects and within-subjects differences in mid- and late careers. Therefore, using only one theoretical perspective to derive research hypotheses may lead to dismissing valid systematic variance as random errors and capitalizing on the sample used for the research.

SUMMARY AND CONCLUSION

While there is an abundance of research and theory on career entry and establishment, a paucity of research and theory exists on the nature of mid- and late career development. However, it is clear that the nature of mid- and late careers themselves is dramatically changing. No longer is it up to the organization to guide a worker's career. Instead, workers in the 21st century will need to be more proactive and contemplative in the career-related decisions they make. In addition, demographic projections clearly indicate that more workers than ever before will face these unique issues at mid- and late career.

Therefore, we briefly reviewed the evolution of career theory from the early 20th century, where middle-aged and older worker career issues were essentially ignored, to the more modern theories, which have a greater appreciation for the continued potential for growth of middle-aged and older workers. We also provided a summary of the major individual, job, and organizational-level influences on midand late careers under the rubric of the changing nature of work, workers, and the workforce in the 21st century. Individual-level factors discussed included the impact of physical and cognitive aging, experience and expertise, as well as work-family-balance demands. Job-level factors related to job characteristics, stressors, and satisfaction were also reviewed. Organizational-level factors such as organizational climate and downsizing were also examined for their impact on mid- and late careers.

We next discussed the changing nature of the transition from late career to retirement and how this process has recently become blurred. Finally, we concluded the chapter with practical implications and applications, as well as several directions for future research in the area of mid- and late careers. In doing so, we hope the reader has gained a greater appreciation for the unique issues faced by mid- and late career workers, as well as the changing nature of mid- and late careers. In addition, we hope the applications section will help career counselors better address the unique needs faced by mid- and late career clients and that the future research directions we have provided will guide future theories made about this increasingly important area.

REFERENCES AND FURTHER READINGS

- Beehr, T. A., & Bowling, N. A. (2002). Career issues facing older workers. In D. C. Feldman (Ed.), Work careers: A developmental perspective (pp. 214–244). San Francisco: Jossey-Bass/John Wiley & Sons.
- Bronte, L. (1993). *The longevity factor*. New York: HarperCollins.
 Brown, D. (1996). Brown's value-based, holistic model of career and life-role choices and satisfaction. In D. Brown & L. O.
 Brooks (Eds.), *Career choice and development* (3rd ed., pp. 337–372). San Francisco: Jossey-Bass.
- Drucker, P. F. (2001, November 1). The next society. *The Economist*. Retrieved August 19, 2007, from http://www.economist.com/printedition/PrinterFriendly.cfm? Story_ID=770819
- Feldman, D. C. (1999). What everyone knows to be true about careers, but isn't: Why common beliefs about managing careers are frequently wrong. *Human Resources Management Review*, 9, 243–246.
- Feldman, D. C. (2007). Career mobility and career stability among older workers. In K. S. Shultz & G. A. Adams (Eds.), *Aging*

- and work in the 21st century (pp. 179–197). Mahwah, NJ: Lawrence Erlbaum Associates.
- Greller, M. M., & Simpson, P. (1999). In search of late career: A review of contemporary social science research applicable to the understanding of late career. *Human Resources Management Review*, 9, 309–347.
- Greller, M. M., & Stroh, L. K. (1995). Careers in midlife and beyond: A fallow field in need of sustenance. *Journal of Vocational Behavior*, 47, 232–247.
- Greller, M. M., & Stroh, L. K. (2004). Making the most of "later-career" for employers and workers themselves: Becoming elders not relics. *Organizational Dynamics*, 33, 202–214.
- Hall, D. T. (2004). The protean career: A quarter century journey. *Journal of Vocational Behavior*, 65, 1–13.
- Hall, D. T., & Mirvis, P. H. (1995). The new career contract: Developing the whole person at midlife and beyond. *Journal of Vocational Behavior*, 47, 269–289.
- Holland, J. L. (1985). Making vocational choices: A theory of careers (2nd ed.). Upper Saddle River, NJ: Prentice Hall.
- Kim, J. E., & Moen, P. (2001). Moving into retirement: Preparations and transitions in late midlife. In M. E. Lachman (Ed.), *Handbook of midlife development* (pp. 487–527). New York: John Wiley & Sons.
- Levinson, D. J., Darrow, C. N., Klein, E. B., Levinson, M. L., & McKee, B. (1978). *The seasons of a man's life*. New York: Knopf.
- Moen, P. (1998). Reconstructing retirement: Careers, couples, and social capital. *Contemporary Gerontology*, *4*, 123–125.
- Moen, P., Kim, J. E., & Hofmeister, H. (2001). Couples' work/ retirement transitions, gender, and martial quality. *Social Psychology Quarterly*, 64, 55–71.
- Neal, M. B., & Hammer, L. B. (2007). Working couples caring for children and aging parents: Effects on work and well-being. Mahwah, NJ: Lawrence Erlbaum Associates.
- Schein, E. H. (1990). *Career anchors*. San Diego, CA: Pfeiffer. Sheehy, G. (1976). *Passages*. New York: Dutton.
- Sterns, H. L., & Huyck, M. H. (2001). The role of work in midlife. In M. E. Lachman (Ed.), *Handbook of midlife development* (pp. 447–486). New York: John Wiley & Sons.
- Sterns, H. L., & Kaplan, J. (2003). Self-management of career and retirement. In G. A. Adams & T. A. Beehr (Eds.), *Retirement: Reasons, processes and results* (pp. 188–213). New York: Springer Publishing.
- Sterns, H. L., & Sterns, A. A. (2005). Past and future directions for career development theory. In P. T. Beatty & Roemer M. S. Visser (Eds.), *Thriving on an aging workforce: Strategies for* organizational and systemic change (pp. 81–91). Malabar, FL: Krieger Publishing.
- Sterns, H. L., & Subich, L. M. (2002). Career development in midcareer. In D. C. Feldman (Ed.), Work careers: A developmental perspective (pp. 186–213). San Francisco: Jossey-Bass/John Wiley & Sons.
- Super, D. E. (1957). *The psychology of careers*. New York: Harper-Collins.
- Super, D. E. (1980). A life-span, life-space approach to career development. *Journal of Vocational Behavior*, 16, 282–298.
- Toossi, M. (2004). Labor force projections t02012: The graying of the U.S. workforce. *Monthly Labor Review*, 127, 3–22.
- Wegman, D. H., & McGee, J. (Eds.). (2004). Health and safety needs of older workers. Washington, DC: The National Academies Press.

PART X

Gender and Diversity in Organizations

DIVERSITY AND DIVERSITY MANAGEMENT IN THE AGE OF GLOBALIZATION

JANET L. KOTTKE AND MARK D. AGARS

California State University, San Bernardino

orkforce demographics have changed drastically over the last 50 years, and continued changes are expected. Economies are now globally determined and multinational organizations are becoming the norm rather than the exception. Today, most organizations have been or soon will be impacted by these changes. As a result, diversity and diversity management within the organizational sciences is one of the most dynamic areas for theory building and research. Defining diversity requires a consideration of its historical antecedents, which includes the civil rights movement and affirmative action. Managing the changes in the workforces of organizations is the notion of diversity management. During the early era of diversity management, very little theory existed to guide the practitioner's actions to creating programs to manage people. Despite the lack of theory, considerable research regarding the effects of diversity within groups exists, and a myriad of diversity initiatives have been implemented. Organizationwide implementations have relied on the case study to investigate the outcomes, which have yielded mixed bottom line results. The true impact of diversity and of diversity initiatives is complex, and requires a comprehensive and multidisciplinary approach. The future changes forecast for

globalization demand that the effects of diversity and their resulting applications be studied.

DEFINING DIVERSITY MANAGEMENT

Defining diversity management from an organizational perspective requires first a definition of workplace diversity itself. These definitions of diversity have evolved significantly over time. Early efforts defined diversity almost exclusively in terms of race and gender differences in the workforce. In some sense, the terms diversity and race and gender were treated synonymously during the 1990s. Since then, however, the meaning of these terms has expanded. In addition to race and gender, individuals with disabilities, older workers, and foreign-born workers (to name only a few examples) became recognized for their contributions to workforce diversity. Beyond the incorporation of additional demographic differences, as efforts to address organizational diversity increased, researchers began to look at a variety of individual differences as well. Differences in experiences, expertise, and knowledge among members of a team might be considered to represent important ele-

ments of diversity. A further conceptualization of diversity has recently been presented which characterizes individual differences as either "surface-level," which refers to characteristics that are easily observed or identified such as race, gender, or age, or "deep-level," which refers to differences that may not be directly observable, but are important characteristics of the individual, such as personality and value system. With this distinction of surface- versus deep-level forms of diversity comes the recognition that each form may raise different challenges for the management of diversity in organizations. Although this latter distinction represents a more comprehensive approach to thinking about diversity, some diversity researchers have expressed concerns that emphasizing deep-level factors may incorrectly suggest that surface-level factors, such as race and gender, are less important for organizations to consider. (Reasons why attention to both levels of diversity is important will be discussed in more detail later.) Despite these concerns, there is no question that a richer understanding of the different forms of diversity in an organization should be incorporated in efforts to develop theories of diversity management and in the practice of diversity management.

Early Efforts to Address Diversity in Organizations

Much like the history of defining diversity, modern forms of diversity management are the result of an evolutionary process that began with rudimentary ways of thinking about demographic differences in the workplace. In response to two key governmental actions, the Civil Rights Act of 1964 and Executive Order 11246 signed by President Johnson in 1965, as well as to growing societal pressures from the civil rights and women's movements, the first programs to deal with diversity began to emerge. These initiatives were not the comprehensive approaches organizations strive for today. Initial programs came in the form of Affirmative Action (AA), and Equal Employment Opportunity (EEO). These programs were primarily aimed at increasing the numbers of underrepresented individuals in the workforce with little consideration of the impact such changes might have on the organization as a whole or on its individual members. Although the intention of such programs was to provide fair opportunities for qualified members of previously underrepresented groups, their implementation often included quota systems or some form of preferential treatment, which, in turn, led to negative reactions and, in some cases, to litigation for reverse discrimination (i.e., discrimination against qualified White males). As a result, attitudes towards AA programs became polarized, and though many people remained strong proponents, many others in organizations and in society saw these policies as unfair. In some cases (e.g., California Proposition 209) legal actions resulted in court decisions that deemed any consideration of race and gender in selection or promotion as unconstitutional. Not only did such programs lead to divided attitudes

among the citizens, they created great skepticism among individuals in the workplace. Because little attention was paid to how such efforts would be perceived, the unfortunate consequence of many AA/EEO efforts was to create a culture of resentment and cynicism towards any diversity effort. To change perceptions, and to improve the quality of diversity efforts, researchers and practitioners began to rethink how to address diversity.

The Emergence of "Diversity Management"

In the early 1990s, theorists and researchers alike changed their thinking about organizational diversity in a fundamental way. Past efforts, both in research and in practice, had conceptualized diversity almost exclusively in terms of the numbers of women and ethnic minorities in the workplace. The focus, therefore, was on developing and implementing AA or EEO programs to increase the number of women and ethnic minorities in organizations. This focus, however, did not adequately consider the impact on the organization and its members. Although AA and EEO practices resulted in increased diversity as expressed in numbers, these early efforts also led to lawsuits alleging unfair hiring and promotion practices, had a negative impact on worker attitudes and perceptions of fairness, and had the ultimate effect of polarizing attitudes toward the process. It was clear that addressing diversity in organizations required a more sophisticated approach, and theorists took note of the need in the last decade of the 20th century.

As researchers continued to advance thought about diversity management, and as practitioners became increasingly involved with diversity initiatives, some began to recognize that diversity is about more than just numbers. Led by individuals such as Taylor Cox (2001), Gary Powell (1993), and Roosevelt Thomas (1990), theory and practice in diversity management began to incorporate the idea that diversity was not a number to be counted, but a resource to be managed. For there to be advancements in the development and implementation of more effective initiatives in organizations, theorists and researchers needed to learn more about the psychological and organizational processes associated with a diverse workforce.

Early Models of Diversity Management

These pioneers of diversity management began with the development of what are now considered the early models of diversity management. These early models were ostensibly categorization schemes for identifying and describing organizations in terms of how they dealt with diversity. Cox (2001) described organizations, based on their level of diversity and approach, as *monolithic* (meaning comprised of only one culture), *pluralistic* (including members of multiple cultures but with limited interaction or consideration of the other), and *multicultural* (an organization that was actively developing a diverse workforce and building from strengths). Powell's (1993) categories were in large part

descriptors of organizational strategy toward and philosophy about diversity; these categories were *benign neglect* (ignoring, without malice, issues of diversity), *reactive* (addressing diversity when problems or issues arose, such as a discrimination lawsuit), and *proactive* (identifying issues of diversity and proactively developing policies and practices to address the needs and strengths of a diverse workforce). Roosevelt Thomas's (1991) categories were reflective of similar distinctions in organizational approaches to the changing face of the workforce. His categorization scheme included *affirmative action*, *valuing diversity*, and *managing diversity*.

Although each of these early models is unique in its description of organizations and organizational diversity efforts, they are united on two important points. Together, these points changed the way researchers and organizations thought about diversity. First, each of these models identify that it is possible to address diversity on different levels, and that organizations range in their efforts to manage diversity. Though each model defines slightly different categories, they all share the common thread of ranging from simplistic to sophisticated in approaching diversity. Second, and most critically, each model identifies that at the most sophisticated level, organizations must see diversity as a resource that must be managed if organizations are to compete in a global economy.

It is clear that these models of diversity management provided an important change for the advancement of diversity management. This new conceptualization represented a fundamental change in the ideas and efforts of both scientists and practitioners in the field. These advances were not, however, without their limitations. Although they provided a goal for organizations to strive for in the form of *active* management of diversity, they offered little in the way of the psychological or organizational processes that were representative of an organization that had successfully achieved the "top" category. Furthermore, the *process* for achieving the top level was unknown.

In subsequent years, additional insights into the diversity management process began to emerge. Theorists began to identify the psychological and organizational processes that may affect efforts to address diversity. One of these insights was the recognition that existing organizational climate would impact the reception of and reaction to initiatives. Consequently, the assessment of organizational culture and climate was identified as a critical component to the development and implementation of diversity initiatives. Similarly, others have argued for the consideration of a "personalization" approach to diversity management. Drawing on fundamental principles of social psychology, the "personalization" approach proposed by Nurcan Ensari and Norman Miller (2006) suggests that personalized contact with out-group members (individuals who are different from the majority within the group) facilitates self-other comparisons and self-disclosure which, in turn, leads to positive social and cognitive outcomes such as the development of trust and familiarity, the breaking down of stereotypes, and ultimately, the development of empathy and the reduction of bias. For the organization, the personalization model as a form of diversity management may result in reduced conflict, litigation, and discrimination while improving productivity and the overall climate.

Integration of Organizational Development Insights

Drawing from research in organizational development, diversity researchers also began to consider the importance of top management support, recognizing that the lack of formal or informal support from top management would undermine diversity initiatives. Other organizational level ideas emerged as well, such as the importance of integrating diversity efforts into the mission, values, and strategy of an organization. Still others recommended conceptualizing diversity management as characteristic of a "learning organization." Learning organizations are adapting, supportive of change, and focused on the development of the workforce, each of which are characteristics that are said to be important to advancing diversity efforts. These advances were critical yet limited in that they largely occurred independently of each other and provided little guidance as to how to achieve the desired changes within the context of diversity. A number of researchers recognized that more comprehensive models were needed.

More Comprehensive Models of Diversity Management

The recognition that diversity was something to be managed was a critical stage in the history of diversity study. But despite the categorized descriptions provided by Cox (2001), Powell (1993), R. Thomas (1991), and others, very little was known about how to transition an organization from a less to more sophisticated stage, or about the individual, organizational, and/or societal obstacles that may emerge when trying to make such a transition. Although these early models described the goal of a more sophisticated organizational approach to diversity, there was minimal guidance on how to achieve a given level of sophistication. Toward the end of the 1990s, advanced models began to emerge that more accurately reflected the complexity of diversity management. Furthermore, in different ways, they began to reflect both the practical complexity of diversity management as well as the multitude of individual and organizational processes that are related.

In building on his earlier ideas, Taylor Cox (2001) introduced the Model for Work On Diversity, which identified five key areas of organizational development, each of which was critical for—and a critical indicator of—an organization's diversity management efforts. The areas he identified were (a) *leadership*, which emphasized the importance of top management vision, strategy, and involvement in the

diversity process; (b) research and measurement, which underscored the importance of diagnosing organizational characteristics and culture, as well as identifying and targeting benchmarks along the way; (c) education, which meant training management and employees on key issues, diversity expertise, and newly implemented policy and procedures; (d) alignment of management systems, which represents the reality that diversity management efforts must be incorporated across all systems within an organization, such as recruitment and selection, socialization processes, performance appraisal, and training; and (e) follow-up, which stresses the importance of accountability, reporting results, and continued growth.

Cox's (2001) model is based primarily on his applied work with multinational organizations headquartered in the United States with offices throughout the World. Although limited in its theoretical foundation, the Model for Work on Diversity provided a comprehensive description of the organizational processes that are involved in effective diversity management. At the same time, a simpler model based on a classic theory of organizational change was introduced by Richard Allen and Kendyl Montgomery (2001); their model was the Model for Creating Diversity. Their contribution was not in taking a comprehensive approach as Taylor Cox had in describing the organizational areas of importance to diversity management, but instead, in the recognition of a key underlying process: organizational change. Their application of social psychologist Kurt Lewin's (1951) model of organizational change introduced a dynamic way of thinking about diversity management. Diversity management was not just an organizational process, but was, fundamentally, a change process. Lewin's model posits that organizations going through change navigate through three phases of (a) unfreezing, (b) moving, and (c) refreezing. Unfreezing requires the organization to recognize and be prepared to eliminate "old" ways of doing things and thus pave the way for change. Changing within the Lewinian framework consists of revising the fundamental structures, such as management hierarchies, and processes, such as how promotions are done, within an organization. At the final stage in Lewin's model, new structures and processes are "refrozen" into place. With their own model, Allen and Montgomery argued that the unfreezing, changing, and refreezing for diversity ultimately ends in a competitive advantage for the diverse organization. From a diversity perspective, thinking in terms of a change model means recognizing that efforts to manage diversity must first consider the current state and culture of the organization. Further, clear objectives and end goals must be identified to facilitate the development of the organization and its individual members. Finally, supports must be in place to ensure that the new state is accepted by employees. Attending to these aspects of change when considering diversity, Allen and Montgomery argued, would maximize the likelihood that the process would be successful and that diversity would become a competitive advantage for the organization.

Diversity Management: Cross-Disciplinary Approaches

In addition to the contributions of the more sophisticated models such as these, diversity management as a field has been advanced by important ideas from fields other than psychology. Some theorists, such as Ann Jordan (1995) or Rajvinder Kandola (1995), have argued that a crossdiscipline approach is necessary to understand and further the field of diversity management. One example of such an advance is the contribution of experts from the field of social work who cogently argue that an important aspect of diversity management in organizations is the incorporation of community responsibility, which means being aware of the impact that an organization has on the community in which it is located, taking into account the community's unique needs and accepting the responsibility to serve those needs in return for the opportunity provided to the organization to grow and to thrive. Anthropologists also offer unique contributions to the field of diversity management by acknowledging the uniqueness of individual organizations within the context of a complex and comprehensive system or network of organizations. Cross-discipline efforts do not require leaving the field of psychology. In fact, many diversity ideas come from within the discipline of psychology, but represent different areas of expertise. For example, social psychological phenomena related to cultural differences, such as the acculturation of individuals into unfamiliar environments, are pertinent to managing diversity—adapting to a more diverse organization might be seen, for example, as comparable to an immigrant's acculturation to a new culture. Similarly, contributions from cognitive psychology include an understanding of the role that cognitive schema (how people categorize information), scripts (how people behave based on expectations), and heuristics ("rules of thumb") play in decision making, including the reduction of bias in important personnel decisions of selection or promotion.

The most recent approach to advancing models of diversity management attempts to incorporate advances from multiple disciplines as well as from the ideas presented by the Model for Creating Diversity and the Model for Work on Diversity. In 2004, Mark Agars and Janet Kottke introduced the Full Integration Theory, which is an attempt to integrate previous theoretical approaches and to identify more completely the underlying processes that facilitate or hinder organizational efforts to manage diversity effectively. In it, they identify diversity management as a change process that includes three stages: (a) issue identification, in which an organization's top management team recognizes that efforts or initiatives related to diversity are needed and changes to organizational mission and strategy are initiated; (b) implementation, in which formal structure, practice, and policy changes are implemented, and behavioral changes are supported; and (c) maintenance, in which structural and cultural goals have been met, efforts to measure and monitor critical diversity variables are introduced, and sociocultural forces work to strengthen a diversity-supportive context.

In addition to the stages themselves, Full Integration Theory identifies four underlying psychological mechanisms that are critical to the transition through each stage and from each stage to the next. Critical to this theoretical development is the suggestion that at each stage, some underlying processes may be more critical than others, and diversity management efforts should consider the potential impact of these underlying process in setting up programs. The underlying processes include perceptions of fairness, perceptions of threat, perceptions of utility, and social cognitions. Perceptions of fairness refer to the extent to which employees perceive personnel decisions and practices to be fair for all employees. These perceptions are critical during the implementation phase, when an organization is introducing new policy and practices. Perceived fairness will facilitate acceptance of these new polices. Similarly, diversity initiatives, because they will forecast change to the status quo, often lead to perceptions of threat. Threat, in turn, leads to increased rigidity, less risk taking and innovation, and greater likelihood of exclusive behaviors (e.g., male managers conducting business while playing golf). Utility refers to the extent to which arguments for diversity can be made in terms of financial matters—the bottom line. Given that skepticism often exists around diversity initiatives, evidence of utility is argued to be a critical component of the successful identification of diversity management as a valued organizational goal, and in its maintenance once policies are introduced. Finally, social cognitions (e.g., stereotypes; in-group biases; beliefs about men, women, and minorities) shape our decision making and our relationships with others in the organization. Management of these cognitions (e.g., limiting the opportunity for stereotypes to impact hiring decisions) is a critical component of effective diversity management as well. Although these four underlying processes may be relevant to many forms of change, the authors include them for the specific implications for change related to diversity.

Although initial efforts to test the model have provided some supportive evidence, much more testing is needed. The value brought by this theory, however, includes the integration of the comprehensive practical nature of Cox's (2001) model with the recognition that diversity management is fundamentally a change process, as identified by Allen and Montgomery (2001). In addition, the identification of underlying processes that serve as explanatory mechanisms for the success or failure of diversity efforts—and the incorporation of these factors at various levels of analyses, including individual, group, organizational, and environmental—provides a significant contribution to practice. Furthermore, Full Integration Theory takes a multidisciplinary approach to diversity management by incorporating ideas from psychology, sociology, organizational studies, economics, and social work. Continued advancement in our understanding of the complex diversity issues presented to organizations will necessarily require a comprehensive approach.

HOW DOES DIVERSITY AND DIVERSITY MANAGEMENT AFFECT INDIVIDUALS, GROUPS, AND ORGANIZATIONS?

Researchers from the social and management sciences have extensively studied diversity and diversity management. Their primary objective has been to determine how diversity and diversity management affects individuals' attitudes, group productivity, and organizational profitability. Achieving this objective has met with mixed success. In general, a great deal is known about the effects of diversity on people's attitudes, somewhat less is known about the effects of diversity on group processes and outcomes, and still less is known about the effects of diversity management on organizational outcomes such as profitability.

First, a Word About the Difficulties in Conducting Diversity Research

Because the topic of interest requires the study of employees and intact groups within the organization, it is often not possible to create the kind of experimental control groups that would permit conclusive comparisons. (This problem, of course, is not specific to diversity management, but is true for most applied sciences, such as management.) Therefore, the bulk of the research conducted in this area can be classified as using the case study method, which is the careful examination of an individual case—person, group, or organization—but does not permit definitive conclusions such as those found in experimental research. Despite the difficulties in conducting experimental research, a number of conclusions can be drawn about how diversity and diversity management affect individual attitudes, group processes, and organizational functioning.

As noted earlier, there are a number of ways in which diversity might be defined. Because most researchers have examined race and gender in their studies, most of the research to be described will reflect what is known when those demographic characteristics are studied. Other types of diversity, such as thinking styles and personality differences, have also been studied.

To provide structure for this review of what is known about the outcomes of diversity and diversity management on people and organizations, research-based knowledge of these effects will be categorized into the levels of data examined: individual, group, and organizationwide.

Individual-Level Interventions and Outcomes

Diversity Training

The most common type of diversity management is diversity training, which consists of programs directed toward individuals with the purpose of creating an awareness of diversity, modifying individuals' attitudes toward others different from them, and ultimately, changing individuals' behavior. Diversity training itself can take a myriad of forms

for individual employees, with the most common including sensitivity workshops, cultural immersion exercises, and skill development. In sensitivity training, employees become more aware of their own biases regarding others. Cultural immersion exercises provide an opportunity for employees to become more knowledgeable about other people's cultures. When employees undergo skill development, they learn and rehearse interpersonal skills. Typically, in all of these kinds of training sessions, employees learn about the changing demographics of the labor force, how diversity differs from AA, the nature of stereotyping and discrimination, and the value of diversity to business success. In follow-up surveys to these kinds of training, women and ethnic minorities report more favorable attitudes toward their employers. A key limitation of these types of interventions is that they are often limited to a focus on changing attitudes, which may not translate into desired behavioral changes. Therefore, the full impact of diversity training on behavioral outcomes is largely unknown.

An Illustration of Individual Diversity Training and Outcome

In one study, Jeanne Hanover and Douglas Cellar (1998) assessed middle managers at a Fortune 500 company. The middle managers had been assigned to either a diversitytraining workshop or a control group. In the diversity-training workshop, the managers were exposed to presenters, videotapes, case studies, simulations, role plays, and group discussion. The control group consisted of managers who had not taken the diversity training at the time of the study, but were expected to receive the training at a later date. Four months before the training and two months after the training, the researchers asked the managers about their attitudes toward the value of diversity and their own behavior toward their employees. Managers who had received the diversity training had more positive attitudes about diversity after the training than those who had not had the training. The managers who had had the training were also more likely to discourage stereotypic comments or jokes at work and were more likely to encourage discussion about how diversity might affect work productivity or group cohesion.

Networking and Mentoring Programs

Another commonly used corporate diversity management initiative directed at individuals is support groups, which are composed of employees with similar backgrounds such as race, gender, nationality, and sexual orientation. In these support groups, peers share their experiences and network. These support groups often provide individuals with the opportunities to interact with more experienced employees (mentors), who can provide guidance in navigating the formal processes and structure of the organization. Many organizations have also set up formal mentoring programs designed for minorities and women. In these programs, protégés are matched with a senior manager or executive

who meets regularly with the protégé, explains the functioning of the organization, and helps the protégé develop the necessary managerial skills to advance in the organization. Research into mentoring programs indicates that protégés benefit both emotionally and professionally from their experiences. There is, however, contradictory evidence regarding how effective these programs are in advancing minorities and women into the executive ranks. Participants in these programs report satisfaction with the programs, but hard data regarding the movement of minorities and women into executive positions indicates only some success.

Attitudes of the Individuals in the Majority Toward Diversity Training

One issue that has been of special interest is how those who have longest been in the majority within organizations—White men—will view diversity programming. White men tend to have less favorable attitudes toward the concept of diversity and diversity management than women and ethnic minorities do. Despite the differences in attitudes, the results of several research studies have indicated that White men are not less satisfied with their jobs, less committed to their organizations, or more likely to leave an organization that initiates diversity management or programs than are minorities and women.

Summary of Empirical Evidence for Individual Interventions and Outcomes

Overall, the empirical evidence supports the claim that diversity training can lead to more positive attitudes about people of different backgrounds. Nevertheless, many questions remain about the factors that influence the development and malleability of these attitudes. Different demographic groups have different attitudes toward organizations that institute diversity programs; however, these differences are not always expressed in behavior. White men are not more likely to leave organizations that institute diversity programs, although they indicate that they are less attached to those organizations than are women and ethnic minorities. Even though attitudes are only the first step in managing diversity, they are important for managers to understand.

Effects of Diversity on Group and Organization Outcomes

Diversity initiatives generally target individuals or whole organizations. Within organizations, of course, are groups or teams of employees who must work together to accomplish the objectives of the organization. Though few diversity initiatives are directed only at groups, there are good reasons to examine the nature of diverse groups. With the continuing globalization and demographic shifts in the workplace, many employees are now working in teams, and those teams are often composed of people with different backgrounds, including different nationalities.

How do groups function when there is considerable diversity in their midst? Although not all research comes to the same conclusions, the research on demographically diverse work groups tends to find the following: diverse groups are less cohesive and have more conflict, and the people within are more likely to withdraw or quit than people in homogeneous groups. On the positive side, heterogeneous groups are more likely to generate novel or creative solutions to problems. These general findings have led to considerable research to explicate the reasons for less group cohesion, more conflict, and higher withdrawal rates.

A Search for Moderator Variables

To better understand the nature of findings about group functioning and outcomes, many researchers have looked for moderator variables; a moderator is a third variable that affects the relationship of two other variables. The goal is to identify other factors that might explain why heterogeneous groups tend to be less productive on most tasks than homogeneous groups. One promising moderator that has been well studied is the nature of conflict within the heterogeneous group. Considerable work has been done on understanding work conflict; this work has classified group conflict into two primary categories: task conflict and emotional (or affective) conflict. Task conflict refers to conflict among the individuals about the group's objectives or about how to perform the work. This type of conflict can be useful because it requires group members to discuss the work to be done and can lead to better group outcomes. Emotional or affective conflict refers to conflicts in personality or personal misunderstandings. Emotional conflict almost always reduces the group's performance because the conflict distracts the group from the work to be done. In heterogeneous groups, the differences in backgrounds and experiences that people bring to the group are likely to create both task and affective conflict.

Why Different Types of Diversity Matter

One of the benefits of identifying moderator variables in studying diversity within groups is that it permits an examination of how different types of diversity may differentially impact a group's functioning and outcomes. As noted earlier, several theorists have suggested there are two basic types of diversity: one based on demographic differences ("surface-level") and another rooted in more deeply embedded and not overtly visible differences ("deep-level"). These deep-seated, or deep-level, differences include different cognitive styles, values, personalities, and beliefs, and they may correspond, to a degree, with the surface-level factors, but are just as likely to be substantially independent of them. Because research has found that deep-level diversity usually affects the outcomes of groups more than surface-level diversity, some researchers have argued that much less attention should be given to the surface-level variables.

The reader should be aware that there might be a disadvantage to abandoning the study of surface-level differences. Diversity researcher Alison Konrad (2003), for example, has argued that focusing on the unobservable differences among individuals to the exclusion of the surface differences would negate the critical work that initiated the diversity movement, work that was born of the very real consequences for people who were and are visibly different from the majority. And in fact, readily observable demographic differences are likely important factors in the formation of groups, even though deep-level differences may be more critical factors in group process. Recent research by Katherine Phillips, Gregory Northcraft, and Margaret Neale (2006) emphasizes the importance of simultaneously examining both surface-level and deep-level diversity. Within a group, observable differences among the individuals serve as a trigger for individuals to consider differences that they might not otherwise notice in a group of people similar to them. The effect of priming thoughts about individual differences subsequently helps group members recognize unique contributions that may result from individual differences within the group. Although the contributions that are most valuable to group outcomes are likely to be a function of deep-level differences, these contributions would probably not be sought in a group without observable differences. Interestingly, this interaction of surface- and deep-level differences provides a paradox for diversity management. A frequent strategy employed in diversity training is to focus on the deeper similarities—values, personality characteristics, cognitive processes—among people with the goal of making people feel comfortable with each other, despite any overt differences such as race or gender. This strategy may be counterproductive to the potential benefits of diversity, which are more creative group solutions. Interestingly, one of the contributions of the personalization model of diversity management noted earlier is that it attempts to address the uniqueness of differences by emphasizing self-disclosure and self-other comparisons with the goal of raising awareness of similarities and differences.

The research to disentangle the effects of these surface and deeper levels of diversity is still in its infancy. One of the difficulties with group research is that few groups are experimentally studied over a lengthy period of time. It is regrettable that there is a trade-off in the study of groups: in general, groups that can be studied for any length of time are already existing work groups for which there will be few comparison groups. The largest number of studies about group diversity has examined artificially constructed groups in classroom settings, which permits experimental control, but also limits generalizability. To date, researchers conducting the latter type of studies have provided the best attempts to understand the underlying processes that affect the outcomes of diverse groups and, ultimately, diversity programs in organizations. Ideally, more field studies will be done in the future to confirm the applicability of results gleaned from controlled experiments to ongoing organizations.

Illustration of an Organizationwide Diversity Initiative

Systemwide changes are the most powerful and affect all individuals within the organization. A case study of Sandia National Labs demonstrates how a systemwide diversity effort works. The workforce of Sandia National Labs historically has consisted of highly educated, mostly White men. In the early 1990s, a job satisfaction survey uncovered a hostile work environment at one of Sandia's main labs. In response to this finding, top leadership determined to change the culture of the organization, yet also to pay close attention to business performance and create more diversity among its workforce. Sandia's first step was to create a diversity planning department that was responsible for developing and implementing plans at all levels of the organization. Fifty employees were trained to serve as internal consultants (called "diversity champions") on issues of diversity; 15 employees underwent additional diversity training and developed a conference on diversity to be presented to the 200 top Sandia leaders, and a group of employees in each division of the company formed diversity councils, which met to identify barriers to high work performance and inclusion. Diversity champions, vice presidents, diversity councils, and the human resource (HR) division worked together to develop family-friendly practices and networking groups, and they included diversity management objectives into managers' performance appraisals. Sandia continues to work toward an inclusive workplace and has been recognized repeatedly for its success. In 2006, for Sandia's attention to diversity, the magazine Diversity Inc named Sandia in its "Top 50" places to work in the United States.

Diversity Management's Impact on Organizations' Profitability

Although there is considerable interest in how diversity and diversity management lend themselves to the bottom line or success of an organization, very few research studies at this level of analysis are available. Most of what is known about the success or failure of diversity initiatives within organizations comes from case analyses of individual organizations such as the Sandia case described briefly in the previous paragraph. Most case studies report success, possibly because few organizations would want to have their failures chronicled in public. With that caveat in mind, there are several researchers who have examined the generally held concept that diversity is good for the bottom line and have analyzed multiple organizations in one study. The results have been equivocal. One strategy has been to compare stock prices for firms that achieved awards for their diversity practices (in the form of AA) to stock prices of firms who had been in litigation for racial and gender discrimination (Wright, Ferris, Hiller, & Kroll, 1995). Under one statistical strategy, the organizations that had won awards had better returns than those who were in litigation,

but when the award-winning firms' stocks were scrutinized with a different method, their stock returns were no better than the firms in litigation (Bierman, 2001).

Other researchers have examined the relationship of the composition of the boards of directors with returns on investment. Companies with the most women and minority directors had investor returns that were appreciably higher than those companies with no women or minority directors (Richard, 2000). Several explanations are possible for these results. The firms with diverse boards may have better access to or understanding of the consumer and employee needs that drive success. Alternately, a firm that chooses to name minorities and women to boards of directors may be able to attract more and larger investors. Finally, it is possible that already financially successful firms are more forward looking when it comes to consumer trends; these firms more quickly recognize that the workforce and the consumer mix are changing, and they want to remain leaders by appointing representatives from the evolving consumer base.

Organizationwide Intervention Effects on Advancement of Women and Ethnic Minorities Into Management

One of the most recent and thorough examinations of the effects of diversity on the number of women and minority men within organizations comes from the work done by sociologists Alexandra Kalev, Frank Dobbin, and Erin Kelly (2006). Kalev and her colleagues collected the information reported on EEO-1 forms for all private U.S. organizations with more than 50 employees or a contract with the federal government of \$50,000 or more. (U.S. firms must file an EEO-1 report annually with the Department of Labor and the Equal Employment Opportunity Commission.) These researchers then selected a sample of more than 800 firms from the EEO-1 reports and contacted the human resource (HR) directors of those companies. The HR directors were asked to describe their companies' diversity interventions, which were categorized into (a) assigning responsibility for AA plans or diversity goals by appointing a specific executive or group to address and monitor diversity goals, (b) reducing biases through diversity training, and (c) providing mentoring and formal networking programs for women and ethnic minorities. These intervention categories were compared with the number of women and ethnic minorities who had achieved management positions in those companies. In line with theoretical expectations that changing organizational structure introduces the most profound changes for an organization's employees, Kalev et al.'s key finding was that requiring responsibility for advancing diversity goals yielded the best results in helping women and ethnic minorities move into management positions. A key method for assigning responsibility was the use of diversity task forces, comparable to the diversity councils created at Sandia Labs. An interesting result was that diversity training and networking and mentoring programs were not effective in their own right, but were made effective by being conducted in organizations that had developed responsibility assignments.

CRITICISMS OF DIVERSITY MANAGEMENT

Among the U.S. public, there has been a mixed reception to diversity management initiatives. This varied reception is most likely a function of the history of diversity management, which shares overlap with the history of AA and civil rights movements. Some, therefore, have argued that diversity management is merely a new, politically correct label for ofttimes-despised AA policies that were perceived to have led to reverse discrimination. Still others have argued that the United States has become a color-blind society and that diversity management (or antidiscrimination laws or AA) is no longer needed. Generally speaking, there is ample evidence that discrimination on the basis of gender or race continues in the workplace. However, even in the face of evidence, not all people agree on the existence of discrimination or its meaning within society, so it is not surprising that there will be disagreements about the proper role of corporations in managing the diversity within their workforces.

Not all negative reactions to diversity programs come from those who believe that discrimination no longer exists. Trade unions, especially those in the European community, have resisted diversity initiatives because they are suspicious that diversity management represents a retreat from a commitment of redressing inequalities in the workplace. More specifically, trade unionists and others are concerned that organizations will focus on "soft" interventions such as training and eliminate the recruitment and selection programs that have benefited women and ethnic minorities. Another criticism of diversity management has been that broadening the rubric of diversity beyond race and gender may dilute the impact of traditional AA programs for the groups who have historically suffered the most discrimination. Interestingly, it is also possible that many Europeans will not want to be categorized in the way that ethnicity is so readily used in the United States. One of the most damning criticisms has been that using the bottom line as an argument for diversity management eliminates the moral responsibility for removing inequalities in society. Diversity management, therefore, may permit governments and individuals to ignore the underlying causes for social inequality and its subsequent consequences (cf. Wrench, 2005). These debates and reservations about diversity management are expected to continue.

DIVERSITY IN THE CONTEXT OF GLOBALIZATION

A final issue that has risen to prominence in the diversity management literature is the understanding of diversity in a global context. Although most of the research reviewed here represents a Western approach to diversity management (reflecting the English language body of literature) there is no question that the globalization of societies in general, and the workforce in particular, implies that diversity management is a global issue. Diversity management on a global scale, however, is not a simple matter.

Approaches to and concerns about diversity vary considerably within the industrialized countries of East Asia and Australia. Diversity programming in Japan, for example, reflects somewhat different concerns than programs in the United States and the European community. The Japanese workforce is relatively ethnically homogenous, but there are more women, more older workers, and more workers who do not expect lifetime employment than there have been in years past. With these demographic shifts, accommodation in the Japanese workplace has begun, but it has progressed slowly. To gain a better understanding of its vast talent pool, researchers in India have begun to explore the large variations within the country's regions and how those differences affect people's attitudes toward work. Diversity programming in Australia and New Zealand shares strong similarities with the diversity initiatives of the United States and Europe, centering on race and gender while also focusing on the special circumstances of indigenous peoples.

Increased globalization creates interesting challenges for the future of diversity management. Cross-cultural differences in values, as well cultural dimensions such as masculinity-femininity (the existence of gender roles in a society), or individualism-collectivism (the emphasis placed on individual achievement versus overall concern for the larger community) represent clear obstacles to the development of "one-size-fits-all" practices of diversity management. As diversity management practices have emerged over the last few decades, key points of emphasis (e.g., goals based on fairness vs. social responsibility vs. performance outcomes) have emerged in different countries, each with a different priority. Although each strategy may, in turn, lead to effective diversity management, the processes that support such efforts may be different, as may the associated outcomes.

FUTURE DIRECTIONS

Diversity management is likely to become more important in the foreseeable future because of a number of global trends that have emerged during the past decade. The demographics of most industrialized countries are shifting, reflecting internal changes such as aging workforces and more working women, but also reflecting continued immigration patterns of people from poorer countries seeking better work opportunities. Multinational companies are expanding into uncharted territories in search of new customers and labor. These changes will demand an understanding of the challenges and opportunities posed by diverse individuals working together. These challenges will

also require that theories to guide research—and ultimately, practice—become sufficiently comprehensive to accommodate the complexities of the emerging workplaces and labor forces. Studying the individual differences at both surface and deep levels will be critical to understanding the new diversity. So, too, there will be the need to seek and gather insights from multiple disciplines to fully appreciate the complex new work world.

REFERENCES AND FURTHER READINGS

- Agars, M. D., & Kottke, J. L. (2004). Models and practice of diversity management: A historical review and presentation of a new integration theory. In M. Stockdale & F. Crosby (Eds.), *The psychology and management of workplace diversity* (pp. 55–77). Oxford, UK: Blackwell Publishers.
- Allen, R. S., & Montgomery, K. A. (2001). Applying an organizational development approach to creating diversity. *Organizational Dynamics*, 30, 149–161.
- Bell, M. P. (2007). *Diversity in organizations*. Mason, OH: Thomson Southwestern.
- Bierman, L. (2001). OFCCP affirmative action awards and stock market reaction. *Labor Law Journal*, 52, 147–156.
- Cox, T. (2001). Creating the multicultural organizations: A strategy for capturing the power of diversity. San Francisco: Sage.
- Ensari, N. K, & Miller, N. (2006). The application of the personalization model in diversity management. *Group Processes and Intergroup Relations*, *9*(4), 589–607.
- Hanover, J. M. B., & Cellar, D. F. (1998). Environmental factors and the effectiveness of workforce diversity training. *Human Resource Development Quarterly*, 9(2), 105–124.
- Harrison, D., Price, K., & Bell, M. (1998). Beyond relational demography: Time and the effects of surface- and deep-level diversity on work group cohesion. *Academy of Management Journal*, *41*, 96–107.
- Johnston, W. B., & Packer, A. H. (1987). Workforce 2000: Work and workers in the 21st century. Indianapolis, IN: Hudson Institute.
- Jordan, A. T. (1995). Managing diversity: Translating anthropological insight for organization studies. *Journal of Applied Behavioral Science*, 31, 124–140.
- Kalev, A., Dobbin, F., & Kelly, E. (2006). Best practices or best guesses? Assessing the efficacy of corporate affirmative ac-

- tion and diversity policies. *American Sociological Review*, 7(4), 589–617.
- Kandola, R. (1995). Managing diversity: New broom or old hat? In C. L. Cooper & I. T. Robertson (Eds.), *International review of industrial and organizational psychology* (Vol. 10, pp. 131–167). London: Wiley.
- Konrad, A. M. (2003). Defining the domain of workplace diversity scholarship. Group & Organization Management, 28(1), 4–17.
- Kottke, J. L., & Agars, M. D. (2005). Understanding the processes that facilitate and hinder efforts to advance women in organizations. *Career Development International*, 10, 190–202.
- Lewin, K. (1951). Field theory in social science. New York: Harper and Row.
- Phillips, K. W., Northcraft, G. B., & Neale, M. A. (2006). Surface-level diversity and decision-making in groups: When does deep-level similarity help? *Group Processes and Intergroup Relations*, 9(4), 467–482.
- Powell, G. (1993). Promoting equal opportunity and valuing cultural diversity. In G. Powell (Ed.), *Women and men in management* (pp. 225–252). Thousand Oaks, CA: Sage.
- Richard, O. (2000). Racial diversity, business strategy, and firm performance: A resource-based view. *Academy of Management Journal*, 43, 164–177.
- Stockdale, M., & Crosby, F. (Eds.). (2004). *The psychology and management of workplace diversity*. Oxford, UK: Blackwell Publishing.
- Thomas, D., & Ely, R. (1996). Making differences matter: A new paradigm for managing diversity. *Harvard Business Review*, 72, 79–90.
- Thomas, K. M. (2005). *Diversity dynamics in the workplace*. San Francisco: Wadsworth.
- Thomas, R.R., Jr. (1990, March/April). From affirmative action to affirming diversity. *Harvard Business Review*, 68, 107–117.
- Thomas, R.R., Jr. (1991). *Beyond race and gender*. New York: American Management Association.
- Williams, K. Y., & O'Reilly, C. A. (1998). Demography and diversity in organizations: A review of 40 years of research. In B. Staw & L. Cummings (Eds.), *Research in organizational behavior* (Vol. 20, pp. 77–140). Greenwich, CT: JAI Press.
- Wrench, J. (2005). Diversity management can be bad for you. *Race & Class*, 46, 73–84.
- Wright, P., Ferris, S. P., Hiller, J. S., & Kroll, M. (1995). Competitiveness through management of diversity: Effects on stock price valuation. *Academy of Management Journal*, 38, 272–287.

ETHNIC AND MINORITY ENTERPRISE

Anuradha Basu

San Jose State University

The topic of ethnic minority entrepreneurship focuses on the creation and growth of new businesses by individuals belonging to minority ethnic communities. In a wider sense, it refers to self-employment among members of ethnic minority communities. The topic is of growing interest for several reasons. With globalization and increasing labor mobility, many countries are experiencing the effects of larger immigrant ethnic minority communities, and these countries want to understand the likely economic and social impact of immigrant entrepreneurship. It is increasingly acknowledged that ethnic minorities have a high propensity to be self-employed and start their own businesses. U.S. census data show that the number of businesses owned by minorities grew 30% between 1992 and 1997, which is four times faster than the number of all businesses which increased by 7% during the same period. A recent study highlights the significant contribution made by ethnic minority immigrant entrepreneurs from China, India, Israel, Lebanon, and Taiwan to job creation and innovation in the United States (Anderson & Platzer, 2006). It is widely believed that ethnic minority entrepreneurship can have positive economic consequences in the form of wealth creation and job creation, and it can also foster integration, reduce social exclusion, and promote urban regeneration. However, all ethnic minority communities are not equally well-represented in business. In the United States, for instance, Asians display a comparatively higher propensity than Blacks and Hispanics do with regard to business ownership. This has resulted in debates about the reasons why members of some ethnic minority groups are more likely than others to start their own businesses, since entrepreneurship is regarded as an important route to

upward economic and social mobility for ethnic minority communities.

THEORY

Definition of the Concept

Several complexities are involved in defining the concept of ethnic minority entrepreneurship. Most simply, it could be defined as a business created and owned solely or primarily by members of an ethnic minority group, as done by some scholars (see Masurel, Nijkamp, Tastan, & Vindigni, 2002). Yet "even the basic terminology is open to debate" (Sonfield, 2005, p. 223). Most of the literature regards ethnic minority entrepreneurs as belonging to an ethnic group, which may be defined as "a set of connections and regular patterns of interaction among people sharing common national background or migration experiences" (Waldinger, Aldrich, Ward, Associates, 1990, p. 33). It is usually acknowledged that ethnic group members belong to a minority, as distinct from the majority, population in society. However, a few researchers define ethnic minority entrepreneurship in contextual terms by considering the extent to which entrepreneurs are involved in their own community (Chaganti & Greene, 2002) or are embedded within their own community context (Kloosterman & Rath, 2001). Some researchers regard disadvantage and social exclusion as central to the definition of ethnic minority entrepreneurship (Barrett, Jones, & McEvoy, 1996). In Europe, ethnic minority entrepreneurs are defined as "entrepreneurs who are immigrants or have an immigrant background" (Liikanen, 2003, p. 2). However, minorities are not always immigrants to a country. For instance, in the United States, American Indians and Natives of Alaskan descent are defined as minority groups in view of their small size relative to the majority population. The National Minority Supplier Development Council in the United States, which is the main official link between large corporations and minority businesses, recently changed its definition of a minority business from one that was at least 51% minority owned to a business that has as little as 30% minority ownership (Sonfield, 2005).

In the ethnic entrepreneurship literature, the term *entrepreneurship* is usually used synonymously with self-employment, rather than focusing on entrepreneurial characteristics such as opportunity seeking, risk taking, innovation, or proactive behavior. Self-employed individuals belonging to ethnic minority communities are defined as entrepreneurs, regardless of whether or not they employ other people or whether they own small businesses on the fringes of the economy or own large, multimillion dollar businesses. This chapter employs this broad interpretation of ethnic minority entrepreneurship as including all forms of self-employment among members of ethnic minority groups, while recognizing the nuances involved.

Ethnic minority businesses have traditionally been more prevalent in sectors like restaurants, retailing, and personnel services because of the lower barriers to entry in these sectors (Basu, 1998; Butler & Greene, 1997). However, ethnic entrepreneurs are a heterogeneous group owing to differences in their cultural and socioeconomic backgrounds (Basu & E. Altinay, 2002; Ibrahim & Galt, 2003). Scholars point to the emergence of highly skilled and "transnational" ethnic entrepreneurs who have leveraged business connections between their country of residence and country of origin (Saxenian, 2006; Zhou, 2004).

Explanations of Ethnic Minority Entrepreneurship

There are several different theoretical approaches to understanding ethnic minority entrepreneurship. While some theories regard ethnic minority entrepreneurship as driven by proactive or "pull" factors, others hypothesize that it is the consequence of reactive or "push" factors. Five approaches—namely, (a) cultural theories, (b) structural theories, (c) network theories, (d) resource-based theories, and (e) opportunity-focused theories—that have some overlapping themes are discussed next.

Cultural Theories

Cultural theories explain the propensity toward entrepreneurship among ethnic minority groups in terms of the groups' cultural beliefs, norms, and values. It is possible to identify two variants of cultural theories. According to established or orthodox cultural theory, a tradition of entrepreneurship and trading among certain ethnic communities like the Gujarati Lohanas, Ismailis, Marwaris, and Sindhis, predisposes members of those communities toward entrepreneurship (Dobbin, 1996; Sowell ,1975). The community's members transmit entrepreneurial values like hard work, the habit of saving, delayed gratification, mutual support, and self-reliance to successive generations and thereby help to preserve the tradition. These cultural attributes encourage members of the ethnic community to become entrepreneurs and also contribute to their entrepreneurial success. In contrast, the lack of such a culture or tradition reduces the chances of entrepreneurship among other groups, as in the case of the Black community in the United States (Sowell, 1975).

Orthodox cultural theory has been criticized for being tautological, since it can be used to "explain" the entrepreneurial behavior of an ethnic minority community once it is known to be successful. Besides, an ethnic community that is regarded as entrepreneurial in one country is not necessarily regarded as entrepreneurial in other countries. For instance, while Cubans and Koreans display considerable entrepreneurship in the United States, they do not display the same level of entrepreneurship elsewhere in the world (Light & Rosenstein, 1995). Similarly, Pakistanis are regarded as entrepreneurial in the United Kingdom (Werbner, 1990), but they do not have the same reputation for entrepreneurship in other countries. This highlights a further limitation of the orthodox cultural theory in that it ignores the role of structural factors such as labor market discrimination faced by ethnic minorities that might push them into entrepreneurship. A recent study of ethnic entrepreneurs based in Hawaii and belonging to six different subcultures has found that while some values are clearly traceable to the entrepreneurs' native culture, the entrepreneurs share certain core values regardless of their cultural origin (Morris & Schindehutte, 2005).

In contrast to orthodox cultural theory, reactive cultural theory states that minority ethnic communities often react to racial discrimination and social exclusion from the majority community by showing greater solidarity and cooperation among their own community members (Portes & Zhou, 1992). Reactive cultural theory captures the role of situational factors and asserts that cultural norms of a community evolve and adapt to circumstances. However, it underestimates the influence on ethnic entrepreneurship of individual characteristics such as the nature and level of education and language proficiency, and the growing cultural and economic links between ethnic minority immigrants based in the adopted country and their country of origin. Nor can it explain the differences in entrepreneurial propensity among disadvantaged ethnic minority groups.

Structural Theories

It is possible to distinguish between two sorts of structural explanations for ethnic minority entrepreneurship. Structural disadvantage explanations emphasize the disadvantages faced by ethnic minorities in the labor market, such as lack of job opportunities or lower wages paid to ethnic minorities compared with their majority counterparts in the same occupation. These disadvantages create structural barriers that prevent ethnic minorities from competing with their majority community counterparts on an equal basis, and these disadvantages push many ethnic minorities into self-employment. Such disadvantages may be racially motivated but could equally be caused by factors like lack of transferable educational qualifications, incompatible work skills, or limited language proficiency among ethnic minorities (Bonacich, 1973). In either case, these disadvantages reduce the rewards of paid employment and motivate or compel members of ethnic minority communities to search for alternative careers in self-employment (Clark & Drinkwater, 1998). It is argued that ethnic minority entrepreneurship can therefore be regarded as a "damage limitation exercise" undertaken out of the necessity to avert unemployment (Jones, McEvoy, & Barrett, 1994, p. 202).

Structural disadvantage theory can be used to explain both the motives for entrepreneurial entry by ethnic minorities and the type of businesses they tend to operate. Bonacich (1973) asserted that a dual or split labor market offers disadvantaged ethnic minorities the opportunity to become a "middleman minority" that connects buyers and sellers. While large suppliers serve large markets, middleman minorities can serve smaller, underserved markets like those in inner-city areas, which are usually inhabited by poorer communities that have been deserted by mainstream retailers and by entrepreneurs from the majority community. In doing so, the ethnic middleman-minority entrepreneurs fill a structural gap in the market and connect the elite with the masses. Middleman-minority entrepreneurs have few social ties with the local community in which they conduct their business operations (Zhou, 2004).

While the structural disadvantage explanation for ethnic entrepreneurship has some empirical support in the literature (see Clark & Drinkwater's 1998 study of self-employment trends by ethnic groups in the United Kingdom), it cannot explain many facets of ethnic minority entrepreneurship. For instance, as acknowledged by Clark and Drinkwater (1998), ethnic minorities who face disadvantage do not universally choose self-employment, which points to the operation of factors and motives other than disadvantage that encourage some, but not other, ethnic minority groups toward entrepreneurship. Moreover, the structural disadvantage theory implicitly assumes that starting one's own business is an easy alternative for ethnic minorities, or is easier than securing paid employment. It neglects the challenges involved in starting a business, such as having some kind of domain knowledge, finding markets with low entry barriers, identifying and reaching target customers, securing finance, negotiating with suppliers, and so on.

In contrast to the structural disadvantage theory, the structural advantage explanation asserts that ethnic minority entrepreneurship stems from a combination of structural advantages or opportunities. These opportunities arise from the emergence of structural gaps in the economy in the form of niche markets to satisfy demands from the coethnic

community for specific goods and services not provided by the majority community businesses, from the shift of businesses owned by majority community members to more prosperous business locations, and from the access to ethnic resources available within the community (Waldinger et al., 1990). The structural advantage explanation implies that ethnic entrepreneurial success would largely depend on the size of the coethnic community. There is some empirical support for this theory. For example, the size of the local ethnic minority population and linguistic isolation among members of that ethnic minority group were found to have a positive effect on ethnic entrepreneurship in a study in Australia (Evans, 1989). The underlying assumption of the theory seems to be that ethnic entrepreneurs react to opportunities created by their coethnic community and the host community rather than proactively seeking and creating new market opportunities. While this assumption is valid to some extent, it is not universally applicable as asserted by recent studies that highlight the emergence of highly skilled, transnational ethnic entrepreneurs described later in this chapter. Many features of the structural advantage theory are captured by network theories discussed next.

Network Theories

Network theory explains ethnic minority entrepreneurship in terms of the utilization of coethnic community networks for the founding, survival, and expansion of ethnic minority businesses, and gaining economic and social mobility through the networks. Ethnic social networks offer access to a trusted pool of relatively inexpensive coethnic employees who are prepared to work long hours (Werbner, 1990). These networks also offer access to finance at favorable rates compared with those offered by banks and other formal financial institutions. Coethnic members are prepared to offer financial support as a gesture of goodwill and in the hope of reciprocity that they may be able to "call in the favor" at a future date (Basu & Parker, 2001). Ethnic social networks also offer access to intangible resources like business advice and information (Flap, Kumcu, & Bulder, 2000; Light & Karageorgis, 1994).

According to Portes (1995), close-knit ethnic community networks generate several elements of social capital such as shared cultural values that encourage members to be altruistic, bounded solidarity stemming from a sense that all community members suffer the same hardships, reciprocal behavior based on previous good deeds, and enforceable trust arising from belonging to the same community. *Enforceable trust* refers to the enforcement capacity of ethnic community networks to protect members against breach of contract and violation of group norms (Portes & Zhou, 1992). These aspects of social capital facilitate interactions and lower transaction costs among community members, and they increase the probability that ethnic minorities will enter entrepreneurship and survive—if not grow—their businesses.

It is possible to identify two types of network explanations for ethnic minority entrepreneurship. The traditional concept of ethnic networks is that of ethnic enclaves, or the concentration of a large ethnic minority community in a particular neighborhood. Ethnic entrepreneurs operating in the ethnic enclave are able to survive by relying on their coethnic community's demand for specific goods and services and by relying on family and community networks for access to resources such as labor, capital, and information. The ethnic enclave, therefore, facilitates the entrepreneur in starting a business that caters to the "protected market" needs of the local coethnic population or a business that requires access to labor or capital from other members of the local coethnic community (Aldrich & Waldinger, 1990).

An alternative conception of ethnic networks transcends geographical boundaries. Ethnic entrepreneurs can avail of ethnic networks in starting and managing their businesses even outside the confines of an ethnic enclave. Such networks can provide support in the form of access to labor, capital, and information even when the entrepreneurs serve a wider, nonethnic population. This is similar to the concept of the ethnic economy, with its dual aspects of coethnic ownership of enterprises and the employment of family and coethnic labor (Light & Karageorgis, 1994). The ethnic economy concept includes ethnic enclave entrepreneurs, as well as ethnic minority entrepreneurs who operate coethnic owned or coethnic controlled businesses in the general economy. This concept can be criticized for being so widely defined that it loses its analytical rigor (Zhou, 2004).

Recent research points to the existence of ethnic community networks that are dispersed across cities, countries, and even continents (Saxenian, 2000). A good example of such a network is The Indus Entrepreneurs (TiE), a network of Indian and South Asian entrepreneurs that was established in California's Silicon Valley in 1992, and had 42 chapters in nine countries by 2007. In the past, the availability of low-skilled immigrants enabled ethnic minority entrepreneurs to engage in activities that were being outsourced. In recent years, the availability of highly skilled ethnic and immigrant employees has added a new twist to ethnic entrepreneurship and the reasons for its success in the high-tech sector, as argued by Zhou (2004). Furthermore, empirical studies suggest that international ethnic networks and linkages play an important role in contributing to the entrepreneurial success of ethnic minority businesses (Basu & Goswami, 1999).

The existence of ethnic social networks need not imply that that the networks will always be valuable to entrepreneurship, as is generally claimed by theory. For example, shared community values and bounded solidarity may promote greater altruism, but may also intensify "groupthink" and risk aversion, and may discourage innovation. Applying Granovetter's (1995) theory of the value of weak ties, it could be argued that relying exclusively on strong coethnic community networks as a source of information may harm the ethnic minority entrepreneur's chances of success.

On one hand, empirical studies of ethnic community networks mostly emphasize their positive effects in providing access to a pool of inexpensive and reliable labor (Metcalf, Modood, & Virdee, 1996; Werbner, 1990). On the other hand, some studies suggest that the excessive reliance on family labor may lead to nepotism and may be damaging to the business, as found by Ram (1994) in his study of ethnic minority businesses in Birmingham, United Kingdom. Similarly, Bates' (1994) study of Asian-immigrant-owned businesses in the United States found that the less successful, failure-prone business owners rely most heavily on coethnic community networks for customers, employees, and finance. Basu and Goswami (1999) found that while family and coethnic networks can play a crucial role at business start-up, they become less significant for business growth. Moreover, coethnic community members may be eager to offer advice, but the value of their advice will depend on the depth and diversity of their experience and knowledge (Basu & E. Altinay, 2003).

The extent to which different network characteristics generate different resources needs further exploration (Yoo, 1998). Also, the proponents of ethnic network explanations like Werbner (1990) and Zimmer and Aldrich (1987) tend to view family and ethnic community networks together, rather than drawing a distinction between them and separating the impact of these two types of networks. Further, ethnic network—and particularly, ethnic enclave—explanations implicitly assume that ethnic minority entrepreneurs have low technical skills and few business ideas except to serve ethnic (or mainstream) customers in low-technology sectors. This underestimates the creativity and technological expertise of many ethnic minority entrepreneurs. This is especially true of the Chinese and Indian hi-tech entrepreneurs in California's Silicon Valley. Finally, ethnic network studies do not examine the relationship between networks and class resources like education even though they are likely to be related. The impact of education on ethnic minority entrepreneurship could be evaluated more precisely by taking account of the presence and impact of networks (Bates, 1994, 1997).

Resource-Based Theories

The ethnic resources theory holds that ethnic entrepreneurs are able to start businesses and manage to compete and survive in business because of their reliance on unique resources from within their own coethnic community that are not available to noncommunity members (Waldinger et al., 1990). Ethnic resources are composed of tangible resources like relatively inexpensive and trustworthy coethnic labor and finance from within the ethnic community. Ethnic resources may also include intangible resources such as the advice and information available from coethnic community members experienced in business and cultural assets like strong family structures. Ethnic resources are typically perceived to be geographically proximate local resources.

Hence, the extent and type of resources available vary by ethnic group as well as with the specific environment. For example, the Chinese community in New York City differs from that of San Francisco; Detroit's Black community differs from that of Atlanta (Light & Gold ,2000). However, such a narrow conception of ethnic resources ignores today's increasingly global world.

The ethnic resources model has been criticized for ignoring the role of socioeconomic or class resources such as education and prior work experience, emphasized by Light (1984), in stimulating entrepreneurial entry and facilitating business survival. Educational attainment has a positive impact on the entrepreneur's knowledge base, or ability to communicate and to evaluate opportunities and replicate business models (Basu & Goswami, 1999). Ethnic entrepreneurs are likely to find it easier to negotiate their position in an alien environment if they are educated and skilled. In addition, work experience in the host country prior to business entry contributes toward enhancing the ethnic minority entrepreneur's human capital and knowledge of the host country environment, thereby lowering the information costs of operating in the host country and improving the chances of starting a viable business. Education and prior work experience in the host country not only enhance human capital, but also provide access to wider social networks beyond the entrepreneur's own ethnic community. The access to multiple networks or greater social capital, together with the educated and experienced entrepreneur's improved communication and negotiation skills, increase the chances of access to financial capital from outside the entrepreneur's own ethnic community.

It could be argued that there are, in fact, close connections between the access to ethnic resources and to class or socioeconomic resources. For example, the access to coethnic community finance depends not only on mutual trust and solidarity between community members, but also on the economic ability of community members to offer such support. Entrepreneurs belonging to minority groups that are less well-off are less likely to have access to this type of finance. Likewise, access to information and advice from coethnic community members depends on the nature and extent of their business experience and knowledge.

Another criticism of resource-based theory is that it neglects the role of proactive strategy in determining the entry and survival of ethnic minority entrepreneurs. It is possible to distinguish between alternative product and market strategies that ethnic entrepreneurs can pursue, in terms of focusing on either coethnic products or mainstream products and on coethnic (local or global) markets or on mainstream (local or global) markets. This offers ethnic minority entrepreneurs the chance to pursue several alternative combinations of product and market strategies (Basu, 2001; Jones, Barrett, & McEvoy, 2000). While a niche market strategy targeting local, ethnic customers may be the most viable at start-up, ethnic entrepreneurs who want to ensure survival and success need to broaden their customer base by serving global or mainstream markets.

Opportunity-Focused Theories

In recent years, a few scholars have highlighted the fact that ethnic minority entrepreneurs do not simply respond opportunities presented by structural gaps in the market or by demands from their coethnic community, as theorized by Bonacich (1973) in the middleman minority concept or by Waldinger et al. (1990) in the argument that ethnic entrepreneurs serve abandoned or underserved markets. Instead, there is a modern breed of ethnic minority entrepreneurs who actively search for and spot business opportunities based on their knowledge of and access to networks in at least two different countries and cultures (Basu & Goswami, 1999). These ethnic minority entrepreneurs are well educated and operate in international markets by serving coethnic customers in more than one nation or serving mainstream customers around the world while locating production in their home or host countries. Zhou (2004) has referred to these entrepreneurs as "transnational ethnic entrepreneurs," since they conduct business across national borders facilitated by the presence of ethnic networks. Saxenian (2006) has referred to them as "the new Argonauts," technically skilled immigrant entrepreneurs from ethnic minority communities who travel frequently between their adopted home in Silicon Valley and their home country and who transfer business knowledge internationally within their trusted coethnic group. Saxenian has argued that instead of causing a brain drain from their home country, the new Argonauts contribute to "brain circulation" or the global sharing of knowledge. While Saxenian's research focuses on technically skilled ethnic minority entrepreneurs, there is evidence of successful ethnic entrepreneurs leveraging their international connections and knowledge in other nonhigh technology fields as well (Basu & E. Altinay, 2002). A common characteristic of these modern ethnic minority entrepreneurs is that instead of selling ethnic products to their own local coethnic community, they sell all kinds of products and services to the wider community, both nationally and internationally, and have broken out of or stayed out of coethnic niche markets (Basu, 2003).

METHODS

Since there are no reliable databases of the population of ethnic minority-owned businesses, most of the research in this field is based on small sample surveys and in-depth interviews with a small number of ethnic minority entrepreneurs, and therefore, uses qualitative analyses. A few studies have employed quantitative analytical techniques either because they evaluate macrolevel data census data (like Clark & Drinkwater's 1998 study of self-employment patterns in the United Kingdom; Fairlie's 2004 analysis of business ownership by ethnicity in the United States) or because they are based on large sample sizes of around 100 or more respondents (e.g., Basu & Goswami, 1999; Basu & Parker, 2001). In studies based on primary data collection,

the samples are usually nonrandom, convenience samples. In a few exceptional cases, when the entrepreneurs studied are geographically and ethnically specific, the samples have included practically the entire population of a specific community in a small, narrowly defined geographical area (as in Srinivasan's 1992 study of ethnic minority businesses in Oxford).

Until the mid-1990s, ethnic minority business research tended to focus on a single community, like the Gujarati Patels (Lyon, 1972), the Pakistanis in Manchester (Werbner, 1990), and the Koreans in Los Angeles (Light & Bonacich, 1988). Some researchers studied heterogeneous groups like British "Asians" as a single homogeneous group (Aldrich, Carter, Jones, & McEvoy, 1981). More recent studies have compared entrepreneurial behavior and characteristics among different ethnic groups in the United Kingdom (Basu, 1998; Basu & E. Altinay, 2002; Basu & Goswami, 1999; Borooah & Hart, 1999; Metcalf et al., 1996; Rafiq, 1992) and the United States (Fairlie, 2004). Comparative intergroup studies are essential because of the differences in entrepreneurial propensity and success displayed by different groups that face similar levels of discrimination in their adopted country. From a policy perspective, it is important to recognize the heterogeneity among ethnic minority groups, in terms of cultural background, history, and socioeconomic position, in order to understand what causes disparities among them and to institute policies that assist those groups that most deserve such assistance.

APPLICATIONS OF THEORIES

Most theories of ethnic minority entrepreneurs are derived from empirical analyses of such entrepreneurs. Empirical studies indicate that individuals belonging to ethnic minority communities choose entrepreneurship for a complex set of reasons rather than because of one overriding factor, as is portrayed by most of the theories. It is found that business entry motives include "push" factors such as a lack of suitable job opportunities, wage discrimination, possibly due to language barriers and the nontransferability of educational and professional qualifications gained in their home countries, and experiencing a glass ceiling. At the same time, they can also be motivated by "pull" factors like identifying an untapped market, a keen desire for control and independence, a desire for financial betterment, and a cultural or historical predilection toward entrepreneurship. The studies imply that entrepreneurial entry can be explained by combining elements of cultural theory, structural theory, network theory, resource-based theories, and opportunityfocused theories described in the previous section. Comparative studies indicate that the motives for and pattern of entrepreneurship vary from one community to another, depending on the antecedents of each community and on contextual factors (as discussed in the next section).

Ethnic minority entrepreneurship is typically found to be a family enterprise, rather than an individual undertaking (Baines & Wheelock, 1998; Basu & E. Altinay, 2003). Traditionally, ethnic minority entrepreneurs employ a high proportion of family members and people from their own ethnic community. They rely on family and community networks for financial support and often for advice and information, as asserted by network theory. The location and type of business determines whether the entrepreneurs cater to the needs of their coethnic population, as described by the ethnic enclave theory, or the mainstream population, as described by the middleman minority theory. Ethnic minority entrepreneurs face many institutional challenges in starting their own businesses. These challenges may stem from their limited awareness of government support programs for new ventures in the host countries and their inadequate access to external funding leading to undercapitalized businesses (see Johnson, Munoz, & Alon, 2007).

Empirical research for the United States shows that English-proficient immigrants encounter greater entrepreneurial opportunities than immigrants who are less proficient in English and who live in ethnically concentrated areas do (Mora & Davila, 2005). This is because the languageproficient entrepreneurs have the ability to access resources within, and sell products to, both their coethnic community and the majority community. In a similar vein, it has been found that survival and success among Asian-immigrantowned small businesses are positively related to the owners' educational attainment and capital investments at start-up rather than to their access to ethnic resources (Bates, 1994). Likewise, Silicon Valley's successful Chinese and Indian entrepreneurs are mostly engineers by training, and they also access knowledge resources through their community networks (Saxenian, 2006). Studies of ethnic minority entrepreneurs in the United Kingdom find a consistently positive relationship between higher education and business growth (Basu & E. Altinay, 2002; Basu & Goswami, 1999) and between English-language communication skills and the ethnic entrepreneurs' competitive edge, even in traditional sectors like catering (L. Altinay & E. Altinay, 2005).

Empirical research indicates a gradual evolution in the characteristics of ethnic minority entrepreneurship, which could be attributed to globalization and to changes in the socioeconomic background of ethnic minority entrepreneurs. The rise of the Internet and of cheaper and faster communication across nations has enabled ethnic minority community members to build and strengthen relationships with family and friends in their country of origin or country of previous residence. This has led to the creation of international business linkages and the emergence of global start-ups, areas that merit further research. Ethnic minority entrepreneurs are also attaining higher levels of education, which is partly related to immigration policies of the destination or host countries. For example, the large number of Chinese and Indian engineers in the United States is due to immigration laws that tend to issue visas to those with higher educational qualifications. It may, therefore, be instructive to distinguish between the traditional ethnic entrepreneur, who tends to have lower educational qualifications and is inward looking, and the more modern, better educated ethnic entrepreneur, who often possesses skills that are highly prized and scarce in the host country. The latter entrepreneur is more likely to spot opportunities overlooked by her or his native counterparts.

COMPARISONS

Comparative research on ethnic minority entrepreneurship has mostly been carried out within the domain of individual countries and regions, particularly, in the United States, and the United Kingdom, as well as in some other countries, including Canada, Germany, and the Netherlands. Empirical studies show that ethnic minority entrepreneurs are a very heterogeneous group, although the reasons for this heterogeneity remain open to debate.

In the United States, the Whites (non-Hispanics) and Asians display much higher rates of self-employment than Hispanics and Blacks display (Fairlie, 2004). Using current population survey data, Fairlie (2004) showed that rates of self-employment among Whites and Asians were about twice as high as those among Hispanics were, and were just under thrice as high as rates among Blacks. However, the data indicated a narrowing of the gap in self-employment rates between Blacks and Whites between 1979 and 1998, which could be attributed to the relative growth in labor force experienced by each of these communities, but could also be related to increasing educational levels among Black men.

In the United Kingdom, data indicate wide variations in the self-employment rate of people from different ethnic communities, with the highest rates displayed among those of Pakistani origin (21.8% of those in employment), followed by those of Chinese (19.1%), Indian (12.5%), Bangladeshi (12.3%), Black Caribbean (7.1%), and Black African (6.6%) origin (U.K. Office of National Statistics, 2005). A comparative study of ethnic minority recent immigrants and long-established immigrants has found that the former display lower rates of entrepreneurship than the latter (Levie, 2007). The above-average rates of self-employment among some communities should not interpreted as indicative of upward mobility, since many ethnic minority entrepreneurs are stuck in precarious market niches where they struggle to survive (Blackburn & Ram, 2006). Nevertheless, the self-employed are better off than those who remain unemployed.

The variations in self-employment rates among ethnic groups cannot be explained by differences in education levels alone, since the Chinese and Indians show the highest levels of educational attainment, compared with lower levels among the Pakistanis and Blacks (U.K. Office of National Statistics, 2005). The low propensity toward entrepreneurship among Blacks may be related to their history of oppression, which resulted in low self-esteem, low motivation, weak family and community ties, and inadequate personal resources (Barrett et al., 1996). In contrast, the

Asians who migrated to Britain from East Africa in the early 1970s were from business and trading families, and they quickly established retail and other businesses in the United Kingdom. A comparative study of U.K.-based ethnic minority entrepreneurs of Bangladeshi, Indian, East African, Pakistani, Turkish, and Cypriot origin found that a family tradition in business and close-knit family networks have a significant effect on entrepreneurs' business entry motives, start-up finance decisions, the type of business started, and the extent of women's participation in business (Basu & E. Altinay, 2002). Hence, contextual factors such as the historical reasons why specific communities became ethnic minority communities, their reasons for migration (if applicable), and the host country's immigration laws that govern the characteristics of the immigrant ethnic minority population, can help to explain differences in the propensity toward entrepreneurship and in entrepreneurial success among different ethnic groups in different countries.

Comparisons between first and second generation ethnic minority immigrant entrepreneurs are gaining gradual attention in the United Kingdom and Europe. A recent study found that first generation South Asian entrepreneurs adopt diversification strategies to access new coethnic and nonethnic markets in order to grow their businesses, whereas second generation entrepreneurs rely more on knowledge skills advantages and technological expertise to grow their businesses (McPherson, 2007).

FUTURE DIRECTIONS

Several areas merit future research. First, as discussed in the introduction, ethnic minority entrepreneurship has the potential to contribute toward economic development and social welfare. The noneconomic or social effects of ethnic entrepreneurship need to be studied in greater detail, especially since the few studies that have been conducted suggest that the social impact of ethnic entrepreneurship may go well beyond the economic success of individual entrepreneurs and contribute toward community building (Zhou, 2004).

Second, while coethnic networks seem to play an important role in influencing the pattern of ethnic minority entrepreneurship, more research is needed to gain a clearer understanding of the impact of networks and social capital on starting up a business and on expanding the business, since it has been argued that family and community networks are more important at start-up than they are for subsequent business expansion (Basu & E. Altinay, 2002; Basu & Goswami, 1999).

Third, the concept of the transnational ethnic entrepreneur needs to be explored in much greater depth. Ethnic minority entrepreneurs' exposure to dual cultures and countries could potentially stimulate their creativity, make them more innovative and alert to environmental changes, and increase their propensity to spot new venture opportunities in a global market. Their international experience and access

to international networks could also enhance their ability to exploit global start-up opportunities and to build successful businesses. These issues merit further investigation.

Further comparative research on the entrepreneurial experience of different ethnic minority groups in different countries and regions would also be valuable. For example, as Johnson, Munoz, and Alon (2007) noted, future research could compare the pattern of entrepreneurship among Filipinos in the United States with those in Canada, Australia, and Japan. Similar studies could be conducted to compare the entrepreneurial behavior of other ethnic minority communities in different countries. Such comparative research would examine the extent to which immigration policies and patterns and environmental differences in the destination or host country account for differences in the propensity toward entrepreneurship among members of an ethnic minority community, the types of new ventures they start, and the success of those ventures. There are very few cross-country comparative studies that examine these issues.

Finally, it would be instructive to compare first and second generation ethnic minority immigrant entrepreneurs as regards the influence of structural factors on their entrepreneurial entry decisions and their reliance on coethnic networks for access to resources. A related area that merits further investigation is the nature of management succession from one generation to the next within ethnic minority-owned businesses.

SUMMARY

This chapter has explained the concept of ethnic minority entrepreneurship while highlighting the nuances involved in its definition and the reasons why the topic is of increasing interest to researchers and policymakers. It has provided an overview of the various theoretical approaches that have been employed to study issues relating to ethnic minority entrepreneurship. Five main sets of theories are reviewed in this chapter. These are (a) cultural theories, (b) structural theories, (c) network theories, (d) resource-based theories, and (e) opportunity-focused theories, which have been used by scholars in the field of ethnic minority entrepreneurship. Although none of these theories offer a complete explanation of the reasons for entrepreneurial entry by ethnic minority entrepreneurs or of the nature of management of ethnic minority-owned businesses, together these theories shed light on the nature and characteristics of ethnic minority entrepreneurs and their businesses. Thus, they imply that ethnic minority entrepreneurship is influenced by the ethnic group's cultural norms, which are, in turn, determined by historical and situational factors. Ethnic minorities may opt for entrepreneurship because they experience structural disadvantages in the host country's labor market or because they enjoy certain structural advantages in their own community's factor and product markets. Coethnic social networks and the access to coethnic resources can also facilitate and foster entrepreneurship within an ethnic minority community. However, ethnic minority entrepreneurs have to access resources and capabilities beyond their local coethnic networks if they wish to expand their businesses. In today's global world, many ethnic minority entrepreneurs actively seek business opportunities by leveraging their knowledge of dual countries and cultures.

Ethnic minority entrepreneurs are a heterogeneous group. While some of them have founded and managed high-growth international businesses, others barely survive on the margins of the economy. Similarly, while some ethnic minority communities are overrepresented in business ownership, others remain underrepresented. Differences in the rates of self-employment and economic advancement among different ethnic communities imply the need for direct policy intervention that is targeted toward the relatively disadvantaged groups. The intervention could take many forms. It could include support for raising the education levels of those groups, generating awareness and enthusiasm among them about entrepreneurship as a career option, offering access to advice, information, and mentoring services, and equipping ethnic minority entrepreneurs with the skills necessary to operate their own businesses and access financial resources. Support agencies could try to identify successful entrepreneur role models for each ethnic minority community to encourage others to follow their example. They could encourage entrepreneurs to form or join both coethnic and nonethnic business networks and associations. Since ethnic minority entrepreneurs are often stuck in marginal businesses, support agencies could help them to review their business strategies and find ways to break out of these businesses that have low entry barriers into more promising industries and markets.

The field of ethnic minority entrepreneurship offers many opportunities for future research. There is a need to better understand the consequences of ethnic entrepreneurship and the role of social networks in facilitating ethnic entrepreneurship. The concept of the transnational ethnic entrepreneur merits further research, as do comparisons of the characteristics and behavior of ethnic entrepreneurs across different countries and successive generations.

REFERENCES AND FURTHER READINGS

Aldrich, H., Carter, J., Jones, T., & McEvoy, D. (1981), Business development and self-segregation: Asian enterprise in three British cities. In C. Peach, V. Robinson, & S. Smith (Eds.), *Ethnic segregation in cities*. London: Croom Helm.

Aldrich, H., & Waldinger, R. (1990). Ethnicity and entrepreneurship. *Annual Review of Sociology*, *16*, 111–135.

Altinay, L., & Altinay, E. (2006). Determinants of ethnic minority entrepreneurial growth in the catering sector. *The Service Industries Journal*, 26(2), 203–221.

Anderson, S., & Platzer, M. (2006). American made: The impact of immigrant entrepreneurs and professionals on U.S. competitiveness. Arlington, VA: National Venture Capital Association.

- Baines, S., & Wheelock, J. (1998). Working for each other: Gender, the household and micro-business survival and growth. *International Small Business Journal*, 5(2) 179–198.
- Barrett, A. G., Jones, T. P., & McEvoy, D. (1996). Ethnic minority business: Theoretical discourse in Britain and north America. *Urban Studies*, *33*(4–5), 783–809.
- Basu, A. (1998). An exploration of entrepreneurial activity among Asian small businesses in Britain. *Small Business Economics*, 10(4), 313–326.
- Basu, A. (2003, August). Overcoming market barriers: Successful 'break out' strategies of immigrant entrepreneurs. Paper presented at the 17th Annual UIC Research Symposium on Marketing and Entrepreneurship, Chicago.
- Basu, A., & Altinay, E. (2002). The interaction between culture and entrepreneurship in London's immigrant businesses. *International Small Business Journal*, 20(4), 371–392.
- Basu, A., & Altinay, E. (2003). Family and work in minority ethnic businesses. Bristol, UK: The Policy Press.
- Basu, A., & Goswami, A. (1999) Determinants of South Asian entrepreneurial growth in Britain: A multivariate analysis. *Small Business Economics*, *13*(1), 313–326.
- Basu, A., & Parker, S. (2001). Family finance and new business start-ups. *Oxford Bulletin of Economics and Statistics*, 63(3), 333–358.
- Bates, T. (1994) Social resources generated by group support networks may not be beneficial to Asian immigrant-owned small businesses. *Social Forces*, 72(3), 671–689.
- Bates, T. (1997). Unequal access: Financial institutions lending to black and white-owned small business start-ups. *Journal of Urban Affairs*, 19, 487–496.
- Blackburn, R., & Ram, M. (2006). Fix or fixation? The contributions and limitations of entrepreneurship and small firms to combating social exclusion. *Entrepreneurship and Regional Development*, *18*(1), 73–89.
- Bonacich, E. (1973). A theory of middleman minorities. *American Sociological Review*, *38*(5), 583–594.
- Borooah, V. K., & Hart, M. (1999). Factors affecting self-employment among Indian and Black Caribbean men in Britain. Small Business Economics, 13(2), 111–119.
- Butler, J., & P. Greene (1997). Ethnic entrepreneurship: The continuous rebirth of American enterprise. In D. L. Sexton & R. W. Smilor (Eds.), *Entrepreneurship 2000* (pp. 267–289). Chicago: Upstart.
- Chaganti, R., & P. Greene (2002). Who are ethnic entrepreneurs? A study of entrepreneurs' ethnic involvement and business characteristics. *Journal of Small Business Management*, 40(2), 126–143.
- Clark, K., & Drinkwater, S. (1998). Ethnicity and self-employment in Britain. Oxford Bulletin of Economics and Statistics, 60(3), 383–407.
- Constant, A., Shachmurove, Y., & Zimmerman, K. F. (2003, November). What makes an entrepreneur and does it pay? Native men, Turks and other migrants in Germany (IZA Discussion Paper No. 940). Bonn, Germany: Institute for the Study of Labour.
- Dobbin, C. (1996). Asian entrepreneurial minorities: Conjoint communities in the making of the world economy, 1570–1940. Richmond: Curzon Press.
- Evans, M. D. R. (1989). Immigrant entrepreneurship: Effects of ethnic market size and isolated labor pool, *American Sociological Review*, *54*(6), 950–962.

- Fairlie, R. W. (2004). Recent trends in ethnic and racial business ownership. *Small Business Economics*, 23(3), 203–218.
- Flap, H., Kumcu, A., & Bulder, B. (2000). The social capital of ethnic entrepreneurs and their business success. In J. Rath (Ed.), *Immigrant businesses: The economic, political and social environment*. London: Macmillan.
- Granovetter, M. (1995). The economic sociology of firms and entrepreneurs. In A. Portes (Ed.), *The economic sociology of immigration: Essays on networks, ethnicity, and entrepreneurship.* New York: Russell Sage Foundation.
- Ibrahim, G., & Galt, V. (2003). Ethnic business development: Toward a theoretical synthesis and policy framework. *Journal of Economics Issues*, 37, 1107–1119.
- Johnson, J., Munoz, M., & Alon, I. (2007) Filipino ethnic entrepreneurship: An integrated review and propositions. *Interna*tional Management Entrepreneurship Journal, 3(1), 69–85.
- Jones, T., Barrett, G., & McEvoy, D. (2000). Market potential as a decisive influence on the performance of ethnic minority business. In J. Rath (Ed.), *Immigrant businesses: The* economic, political and social environment. London: Macmillan.
- Jones, T., McEvoy, D., & Barrett, G. (1994). Labour intensive practices in the ethnic minority firm. In J. Atkinson & D. Storey (Eds.), *Employment*, the small firm and the labour market. London: Routledge.
- Kloosterman, R., & Rath, J. (2001). Immigrant entrepreneurs in advanced economies: Mixed embeddedness further explored [Special issue]. *Journal of Ethnic and Migration Studies*, 27(2), 189–202.
- Levie, J. (2007). Immigration, in-migration, ethnicity and entrepreneurship in the United Kingdom. Small Business Economics, 28(2-3), 143–169.
- Light, I. (1984). Immigrant and ethnic enterprise in North America. *Ethnic and Racial Studies*, 7(2), 195–216.
- Light, I & Bonacich, E. (1988). Immigrant entrepreneurs: Koreans in Los Angeles 1965–82. Berkeley: University of California Press
- Light, I., & Gold, S. J. (2000). Ethnic economies. San Diego, CA: Academic Press.
- Light, I., & Karageorgis, S. (1994). The ethnic economy. In N. Smelser & R. Swedberg (Eds.), Handbook of economic sociology. New York: Russell Sage Foundation.
- Light, I., & Rosenstein, C. (1995). *Race, ethnicity and entrepre*neurship in urban America. New York: Aldine de Gruyter.
- Liikanen, E. (2003, June 26). Entrepreneurs from ethnic minority communities: An opportunity for a more entrepreneurial Europe. Speech presented at a conference on Ethnic Entrepreneurship, Brussels, Belgium.
- Lyon, M. (1972) Ethnicity in Britain: the Gujarati Tradition. New Community, 2(1), 1–12.
- Mars, G., & Ward, R. (1984). Ethnic business development in Britain: Opportunities and resources. In R. Ward & R. Jenkins (Eds.), *Ethnic communities in business*. Cambridge, UK: Cambridge University Press.
- Masurel, E., Nijkamp, P., Tastan, M., & Vindigni, G. (2002). Motivations and performance conditions for ethnic entrepreneurship. *Growth and Change*, *33*(2), 238–260.
- McPherson, M. (2007). A comparison of marketing practices: Perspectives from first and second generation UK South Asians. *International Journal of Consumer Studies*, 31(2), 174–186.

- Metcalf, H., Modood, T., & Virdee, S. (1996). *Asian self-employ-ment: The interaction of culture and economics in England*. London: Policy Studies Institute.
- Mora, M., & Davila, A. (2005). Ethnic group size, linguistic isolation, and immigrant entrepreneurship in the USA. *Entrepreneurship & Regional Development*, 17(5), 389–404.
- Morris, M., & Schindehutte, M. (2005). Entrepreneurial values and the ethnic enterprise: An examination of six subcultures. *Journal of Small Business Management*, *43*(4), 453–479.
- Portes, A. (1995). Economic sociology and the sociology of immigration: A conceptual overview. In A. Portes (Ed.), *The economic sociology of immigration: Essays on networks, ethnicity, and entrepreneurship.* New York: Russell Sage Foundation.
- Portes, A., & Zhou, M. (1992). Gaining the upper hand: Economic mobility among immigrant and domestic minorities. *Ethnic* and Racial Studies, 15(4), 491–522.
- Rafiq, M. (1992). Ethnicity and enterprise: A comparison of Muslim and-Muslim owned Asian Businesses in Britain. *New Community*, *19*(1), 43–60.
- Ram, M. (1994). Managing to survive: Working lives in small firms. Oxford, UK: Blackwell.
- Saxenian, A. (2000). Networks of immigrant entrepreneurs. In C. M. Lee, W. F. Miller, M. G. Hancock, & H. S. Rowen (Eds.), *The Silicon Valley edge*. Stanford, CA: Stanford University Press.
- Saxenian, A. (2006). *The new Argonauts: Regional advantage in a global economy* Cambridge, MA: Harvard University Press.

- Sonfield, M. C. (2005). A new definition of 'minority business': Lessons from the first four years. *Entrepreneurship and Regional Development*, 17(3), 223–235.
- Sowell, T. (1975) *Race and Economics* New York: David McKay.
- Srinivasan, S. (1992). The class position of the Asian petty bourgeoisie. *New Community*, 19(1), 61–74.
- U.K. Office of National Statistics. (2007). Ethnicity and identity. Retrieved September 16, 2007, from http://www.statistics.gov.uk/cci/nugget.asp?id=461
- U.S. Census Bureau. (2001). 1997 Economic Census: Survey of Minority-Owned Business Enterprises. Washington DC: Author. Retrieved September 16, 2007, from http://www.census.gov/prod/ec97/e97cs-7.pdf
- Waldinger, R., Aldrich, H., Ward, R., & Associates. (1990). *Ethnic entrepreneurs: Immigrant business in industrial societies*. London: Sage.
- Werbner, P. (1990). Renewing an industrial past: British Pakistani entrepreneurship in Manchester. *Migration*, 8(1), 17–41.
- Yoo, J. K. (1998). *Korean immigrant entrepreneurs: Networks and resources*. New York: Garland Publishing.
- Zimmer, C., & Aldrich, H. (1987) Resource mobilization through ethnic networks: Kinship and friendship ties of shopkeepers in England. *Sociological Perspectives*, 30(4), 422–445.
- Zhou, M. (2004). Revisiting ethnic entrepreneurship: Convergencies, controversies, and conceptual advancements. *International Migration Review*, 38(3), 1040–1074.

Aging and Work Motivation

RUTH KANFER AND PHILLIP L. ACKERMAN Georgia Institute of Technology

n developed countries around the world such as Germany, Japan, the United Kingdom, and the United States, midlife (aged 45–65) and older (aged 65 and older) persons represent the fastest growing segments of the active workforce. Several factors contribute to this trend. Although mean age of retirement has declined by about 5 years over the past 5 decades, the rapid rise of life expectancy (by about 7 years over the same period) means that there is a much larger population of older individuals. In addition, recent changes in economic conditions, advances in health care, and significant shifts in sociocultural attitudes toward work and associated legislation have encouraged more individuals to engage in paid work well into their 7th decade of life. At the same time, low birthrates during the late 20th century and longer periods of educational training have contributed to a decline in the number of available younger workers, particularly in positions that require extensive training or work experience. As a practical consequence of these trends, organizations, of necessity, have focused increasing attention on midlife and older workers and on age-related influences on motivation, performance, and productivity. In response, a small but growing number of organizational scholars have examined the effects of aging and an agediverse workforce for the development of a diverse array of human resource functions including the attraction, training, management, and retention of older workers.

The purpose of this chapter is to provide an overview of age-related influences on work motivation and its outcomes. In the first section, we provide a brief overview of the key constructs and mechanisms involved in work motivation. In the second section, we discuss two major sources of age-related influences on motivation: (a) socialcontextual influences and (b) changes in person characteristics over the life span. In the third section, we discuss four age-related change patterns in person attributes that influence key determinants of motivation and performance. In the fourth section, we consider indirect influences on motivation associated with age bias in managerial decision making and worker perceptions of age discrimination. In the fifth and final section, we describe how age-related factors may influence workplace motivation, and we describe implications of theory and research for the development of effective practices to sustain and promote work motivation in an aging workforce.

WORK MOTIVATION: AN OVERVIEW

Work motivation pertains to the dynamic person and contextual factors that influence an individual's ongoing choice among goals, allocation of personal resources (in the form of time and effort), and strategies implemented for goal accomplishment (see Kanfer, Chen, & Pritchard, in press). An individual's motivation, expressed in terms of goal choice, behavioral intentions, intensity of effort toward goal accomplishment, and persistence has long been rec-

ognized as a key determinant of job performance and work adjustment. Over the past 80 years, diverse approaches to work motivation have converged on a broad picture of how motivational processes operate.

In the work context, motivation is typically conceptualized as a set of two interrelated processes-namely, goal choice and goal striving. Individual differences in cognitive abilities, skills, nonability traits (e.g., personality), motives, and interests along with situational factors have been shown to influence both the goals that individuals consciously adopt and the action-regulatory processes by which individuals pursue goal accomplishment over time. Theories that focus on the determinants of goal choice typically conceptualize the decision about which goal an individual adopts to be a function of conscious, cognitive processes directed toward maximizing anticipated positive outcomes and minimizing anticipated negative outcomes. In expectancy-value formulations, for example, the individual is posited to adopt task and performance goals based on consideration of three subjective perceptions: the perceived relation between different levels of effort and levels of performance (the effort-performance or E-P function), the perceived relation between different levels of performance and different outcomes (the performanceoutcome or P-O function), and the perceived attractiveness of different anticipated outcomes (valence or V). Building on this model, Kanfer (1987) proposed that individuals seek to maximize the perceived E-P function, the perceived relation between different performance levels and their utility or value (performance-utility or P-U), and the perceived relation between different levels of effort and their utility or value (effort utility or E-U). Individual differences in person characteristics and situational influences affect the individual's goal choice through their influence on these perceived functions.

In instances where a goal can be readily accomplished such as happens when one chooses to quit writing and turn off the computer, there is usually no need for further motivational processing. However, as is often the case at work, an individual's goals may be complex, ill defined, and/or require a lengthy period to accomplish. Individuals seeking a promotion, for example, must demonstrate their appropriateness for the position by successfully completing a variety of tasks and projects. In these instances, the individual must employ self-regulatory or goal striving processes to ensure successful completion of the requisite tasks in order to achieve their long-term goal. Theories of goal striving and self-regulation posit that individuals who are committed to their goal will monitor their performance, evaluate their progress, and adjust behavior and affect to facilitate goal accomplishment. Substantial literature provides support for these activities, and further suggests that the motivational orientation that an individual adopts may influence goal striving and performance (see, e.g., Klein, Austin, & Cooper, in press). For example, several studies find that individuals who pursue goals for the purpose of learning and mastery respond more tenaciously in the face of failure or error compared to persons who pursue goals for performing well to prove their competency.

Theories of work motivation address purposive or conscious goal setting and striving, but tend to neglect implicit or affectively driven motivational processes that might interfere with conscious goal pursuit. In the personality domain, emerging research literature suggests that emotional reactions to a situation or work event (e.g., a supervisor's reprimand) may prompt fast, nonconsciously mediated behavioral tendencies that disrupt or conflict with conscious goal accomplishment (see, e.g., Kehr, 2004). A student who accidentally loses a computer file while writing a paper, for example, may become frustrated and quit work despite his or her strong commitment to the goal of finishing the paper assignment. As research on emotion regulation suggests, self-regulatory processes that promote performance may be focused on behavior and/or affect. The regulation of disruptive emotions during goal pursuit represents an area of increasing importance in motivation research, particularly for jobs that make strong demands on composure in interpersonal relations.

Although most work-motivation theories emphasize the role of nonability traits and situational factors, an individual's E-P expectancy is also importantly influenced by the individual's perception of his or her cognitive abilities, knowledge, and skills relative to the demands of the job or task goal. As discussed later, developmental changes in the individual's abilities, knowledge, and skills importantly affect the individual's perceived competency and, in turn, motivation and performance.

Age-Related Influences on Work Motivation

The effects of age-related variables on work motivation may be usefully organized into three broad categories. The first category pertains to the influence of the life-spanlinked interpersonal and social context, in particular the effects of generational or cohort differences that may lead midlife and older workers to experience fewer opportunities for skill development and work role change than younger workers or lead older workers to perceive themselves as less instrumental to the accomplishment of organizational goals. Social features of the work environment influence motivation among aging workers by altering the individual's beliefs and attitudes toward the attractiveness of work and/or expectations of job success.

In contrast, the second category of age-related influence on work motivation, which is the focus of this chapter, pertains to the way that age-related changes in the individual affect the adoption and pursuit of work goals. Numerous studies document age-related changes in cognitive abilities, job experiences, knowledge, motives, affect, and self-regulatory skills across the life span. These various changes (that occur at different rates both across the life span and among individuals) are posited to influence work motivation through their influence on an individual's goals and the strategies and skills that are utilized for goal accomplishment.

The third, perhaps most well-known category of agerelated influences on work motivation and performance pertains to the use of age as a grouping variable and the use of age-graded norms and age-based stereotypes in personnel decision making and interpersonal communications. Age bias and use of age stereotypes by supervisors and others in the workplace are generally considered detrimental to work motivation and organizational effectiveness. Over the past 15 years or so, a growing body of research has focused on the prevalence, origins, and malleability of these beliefs and attitudes.

Social Cohort Influences

Chronological age is closely associated with an individual's life experiences. Generational or age cohorts encapsulate the common experiences of persons within a particular age range—historical experiences such as war, economic upheavals, and major technological innovations help to shape core values and beliefs that distinguish cohorts from one another. For example, the currently graying cohort group, referred to as the baby boomers (born 1946-1964), are often described as placing high value on personal growth, on health, and on retaining youth. In contrast, the smaller and next generation cohort, Generation Xers (born 1965–1980), are frequently described as placing high value on pragmatism, informality, global orientation, and self-reliance. The current entry-level generational cohort, Generation Yers or Millenials (born 1980-2000), are described as confident, as optimistic, and as placing high value on civic duty, flexibility, and achievement. In many organizations, three or more generational cohorts may work together. In some instances, distinct generational differences in attitudes and behaviors provide the basis for intergenerational conflicts and misunderstandings such as in-group bias that can serve to dampen motivation among one group or another. Several studies provide evidence of an in-group age-related bias, where younger and older workers rate same cohort employees more positively on work attributes than they rate different cohort employees (e.g., Forte & Hansvick, 1999). As such, the impact of intergenerational differences on work motivation represents an indirect, but potentially important factor that may contribute to feelings of discouragement, low work self-confidence, and job withdrawal among older workers.

Adult Development Influences

The second category of research, which is the focus of this chapter, pertains to the pathways by which normative, age-related changes in cognitive abilities, job experiences, knowledge, motives, affect, and self-regulatory skills affect motivation related to the adoption and pursuit of work goals. Over the adult life span, physical competencies gradually decline and may encourage early retirement among workers engaged in physically demanding jobs. In developed countries, however, many jobs such as plumber, pilot, and

surgeon place relatively few demands on physical abilities. Rather, these jobs tend to place strong demands on cognitive abilities and knowledge. In contrast, jobs such as call center representative and nurse place substantial demands on interpersonal skills. In these contexts, work motivation may change over the life span because of biological/maturational changes that contribute to difficulties in meeting task demands, change in the individual's motive strength, and/or changes in the attractiveness of incentives for performance. Building on research in basic psychology, Kanfer and Ackerman (2004) identified four major themes associated with adult development over the life span that influence work motivation. These are discussed next.

Maturation Themes in Adult Development

Kanfer and Ackerman (2004) organized findings on the myriad maturational changes that occur across the life span in terms of four major themes. The first two themes pertain to two divergent developmental changes in intellectual development. The first and probably most well-known pattern is characterized by age-related loss and decline in select cognitive abilities. Findings in life span developmental psychology point to a general trend of decline in fluid intellectual abilities (Gf) once individuals reach early adulthood, which are reflected in performance of abstract reasoning and novel memory tasks. Although the trend toward lower performance appears to be robust, especially for tasks that are highly speeded, there are marked differences in individual trajectories, and marked changes may not develop until middle age and beyond (e.g., see Schaie, 1996). However, this pattern of gradual decline in critical cognitive processes associated with learning and speeded performance has led a number of scholars and practitioners to attribute poor job performance to age-related cognitive decline.

In contrast, as a growing number of researchers have noted, Gf represents only one part of the intellectual repertoire of adults. Crystallized intellectual abilities (Gc) represent the depth and breadth of domain knowledge and skills that an individual has (e.g., see Ackerman, 1996; Cattell, 1987). Where Gf abilities tend to decline during adulthood, the vocational (job related) and avocational (e.g., hobbies, music, literature, etc.) knowledge and skills that make up Gc tend to be stable or even show increases well into adulthood (up to about age 70). For example, findings obtained by Ackerman and his colleagues (e.g., Ackerman, 2000; Beier & Ackerman, 2001, 2003) have shown that middle-aged adults are at least as knowledgeable as young adults or more knowledgeable than young adults on a wide variety of different topic domains, ranging from social science, humanities, business and law, health and nutrition, and current events. Consistent with these findings, Schmidt, Hunter, and Outerbridge (1986) found that individual differences in job knowledge represent a more potent predictor of job performance than measures of general, fluid-type cognitive abilities. That is, in many jobs, role-related knowledge that increases with age represents a strong predictor of job performance.

The differential maturational patterns of intellectual development and knowledge across the life span help to explain why meta-analyses of the age—job performance relation typically show no significant relationship. Kanfer and Ackerman (2004) suggested that the cognitive demands of the work role and individual differences in job knowledge mediate the age-performance relation and affect work motivation through their impact on self-efficacy and performance expectations. All other factors equal, in jobs and work roles such as in air traffic controller, which place high-sustained demands on Gf, performance declines in association with age-related declines in Gf. In contrast, in jobs and work roles such as that of a lawyer or teacher, which place high demands on Gc and job knowledge, performance can be expected to remain stable or improve across midlife. As such, the influence of changes in cognitive abilities and knowledge on job performance critically depend on the cognitive demands of the job. As Kanfer and Ackerman (2004) suggested, one can expect the effects of age on performance to be more pronounced in jobs that place stronger demands on fluid intellectual abilities than on job related knowledge.

The third and fourth maturational patterns reported by developmental, personality, and life span researchers pertain to the development of the self. Specifically, studies suggest that individuals show reorganization and discontinuity in motives, goals, affect, and emotions across the life span. Carstensen (1998) and her colleagues' research, for example, shows age-related differences in goals and emotion regulation. According to Carstensen's socioemotional selectivity theory, action goals and motives during early adulthood are directed toward promoting self-concept through accomplishments. At midlife, as the individual's focus shifts toward "time left to live," there is a gradual tendency to shift attention toward goals that emphasize protecting self-concept and affirming a positive identity. McAdams (2001) and his colleagues' research further indicates the emergence of generativity motives related to knowledge transfer and helping behaviors during midlife. From a motivational perspective, the reorganization of motives and goals for action across the life span indicates the existence of age-related differences in the attractiveness of work tasks and organizational incentives for performance.

A fourth and related maturational pattern pertains to changes in the strength of personality-based action tendencies across the life span. Recent meta-analytic findings by Roberts, Walton, and Viechtbaurer (2006), using longitudinal studies research designs, show that individual differences in personality traits such as conscientiousness, extraversion, agreeableness, neuroticism, and openness exhibit change across the lifetime. Specifically, social vitality (a facet of extraversion), neuroticism, and openness showed relative stability in midlife and slight age-related declines in late life, with social dominance (a facet of extraversion), conscientiousness and agreeableness showing age-related increases across mid- and late life. It is important to note, however, that such changes represent within-individual dif-

ferences rather than between-individual differences. That is, individuals who are highly extraverted compared to others may exhibit decline in extraverted action tendencies across the life span, but can be expected to remain higher in extraversion compared to their cohort group. The normative change in action tendencies across the life span suggests that midlife to late-life workers, on average, may show higher mean levels of responsibility, duty, and cooperation and lower mean levels of social vitality, neuroticism, and openness to new experiences compared to younger workers. Similarly, in a cross-sectional study of motivational traits, Kanfer and Ackerman (2000) found that midlife adults showed lower levels of achievement-oriented motive strength than young adults and that midlife women showed lower levels of competitive excellence compared to both midlife men and young adults.

ADULT DEVELOPMENT AND WORK MOTIVATION

In this section, we describe how the four maturational patterns previously described influence work motivation. Building on the expectancy-value formulation described by Kanfer (1987), we consider the impact of each pattern on the perceived E-P function, the perceived P-U function, and the perceived E-U function.

According to Kanfer and Ackerman (2004), the two patterns of decline and growth in intellectual development are posited to influence motivational processes largely through their impact on the perceived relation between effort and performance levels (i.e., the E-P function). Building on prior research that maps level of attentional effort (i.e., E) to level of Gf resources, age-related declines in Gf are proposed to lead midlife and older workers to perceive a steeper E-P relation in jobs and work roles that make high demands on Gf. That is, in jobs such as air traffic controller, age-related declines in Gf are posited to require older individuals to compensate for declining performance with higher levels of effort. Over the long term, however, sustained effort (undertaken to overcome decline in Gf) are likely to increase stress, reduce self-efficacy, and ultimately, reduce work motivation.

In contrast, in high Gc jobs, where the job or work role places high demands on domain knowledge and the use of well-developed routines, midlife workers can expect to perform at higher levels with less effort as a consequence of increasing job knowledge and skill development across the life span. Senior accountants, for example, may maintain high levels of performance with relatively less attentional effort than new accountants who are less familiar with procedures and tax laws. In contrast to jobs that place high demands on Gf, for individuals in high Gc dependent jobs, older individuals are likely to perceive a flat, asymptotic relation between different levels of effort and performance. As a consequence, motivational problems among midlife and late-life workers in these jobs are expected to more

frequently involve boredom or perceived lack of job challenge. In these situations, the critical problem is insufficient motivation rather than failure of motivation to compensate for declining abilities.

Two aspects of how intellectual development patterns influence the E-P function in different work roles warrant note. First, many jobs and work roles make demands on both Gf and domain knowledge. Skilled surgeons, for example, may perform with relatively low levels of attentional effort for routine procedures. Unexpected and sudden, lifethreatening problems, however, are likely to make demands on fluid intellectual abilities and require substantial effort (e.g., see the study of surgeon age and operative mortality by Waljee, Greenfield, Dimick, & Birkmeyer, 2006). In work roles that contain an admixture of demands on both Gf and Gc, work motivation and performance may be more variable and situation specific. Second, perceptions of the E-P relation will depend on the specifics of the work role. Inaccurate perceptions of the E-P function may increase or decrease work motivation. Individuals who perceive that increased effort will compensate for declining fluid intellectual abilities, for example, may exert higher initial levels of effort. In contrast, individuals who perceive that increased effort will have insignificant effects on performance may become discouraged and subsequently lower work motivation, even in situations where changes in effort might yield appreciable benefit in performance.

The third and fourth patterns in adult development, related to changes in the self, are posited to influence work motivation through their influence on the perceived relation between performance and outcomes (i.e., the P-U function) and the perceived value of effort expenditures (i.e., the E-U function). During midlife and late life, motive exchange can be expected to alter the perceived utility or value of different levels and types of task performance (i.e., the P-U function). Specifically, evidence for motive reorganization suggests that midlife and older workers are likely to place a high value on performance accomplishments associated with the attainment of experiential or protective outcomes such as skill utilization, coworker recognition, and pay security. In contrast, compared to younger workers, older workers are likely to place a lower value on performance accomplishments associated with the attainment of instrumental outcomes such as promotions and competitive excellence. From a practical perspective, age-related motive reorganization suggests that pay-based incentives for performance may be less effective in motivating older workers than they are in motivating younger workers.

The perceived utility of effort (i.e., the E-U function) refers to the intrinsic value of effort expenditure, and it is generally represented as an inverted U-shaped function in which very low or high levels of effort expenditure are regarded less positively than moderate levels of effort expenditure are. Although there is no direct evidence to date on age-related change in the form of the E-U function across the life span, Kanfer and Ackerman (2004) proposed that age-related changes in personality action tendencies

are likely to shift the function such that older workers are more likely to find higher levels of work effort to be more aversive when compared to younger workers. Heckhausen and Schultz (1998) obtained indirect evidence to support this notion. They found that, compared to younger workers, older workers report a decrease in the salience of work goals and an increase in the salience of nonwork effort expenditures related to health and social activities. From a work motivation perspective, these changes are likely to reduce the adoption of work goals that demand substantial and sustained expenditures of effort in the absence of powerful and personally meaningful incentives.

Age as a Grouping Variable

The preceding discussion of social and maturational influences on work motivation suggests that there is no structural difference in the mechanisms underlying work motivation among younger and older workers. Rather, changes in work motivation occur as a function of changes in personal characteristics, interests, task demands, and organizational systems that provide individuals with personally meaningful incentives for resource allocation and action. That is, within individuals, changes in competencies, capabilities, interests, job demands, and organizational systems alter work motivation and/or work-related outcomes such as job performance over time. From a cross-sectional perspective, however, age-related differences in work motivation may also occur because of contextual factors such as when supervisors or workers use age as a grouping variable in the development of norms that influence decisions pertaining to the allocation of opportunities, resources, or incentives. Supervisors, for example, may hold age-related stereotypes with respect to personal characteristics such as learning, adaptability, dependability, maximal performance capability, and interpersonal skills. These stereotypes, in turn, may influence decisions about whether older workers are afforded training or promotional opportunities. Similarly, older workers who perceive themselves as part of the older workforce may believe that they will be more likely to experience discrimination and thus become more easily discouraged with respect to employment opportunities. As such, motivating an aging workforce also requires consideration of how age stereotypes may influence managerial decisions. In this section, we discuss findings on age bias and consider how age-related beliefs and stereotypes held by organizational personnel and older workers may influence work motivation.

Age Bias and Stereotyping

A prominent concern in the study of workforce aging pertains to the detrimental influence that age bias or negative stereotyping of older workers may exert on older worker opportunities and, by extension, work motivation. In the United States, the Age Discrimination in Employment Act (ADEA) of 1967 prohibits discrimination against

a person (over 40 years of age), based on age with respect to hiring, firing, promotion, layoff, compensation, benefits, job assignments, and training. Legislation that prohibits age discrimination prior to age 65 and extends protection against unfair terminations after age 65 was also passed in the United Kingdom in 2006. Nonetheless, there is widespread concern that age bias in the form of negative stereotyping of older workers may dampen work motivation and disadvantage older workers. Evaluations based on age group stereotypes, rather than the individual's capabilities, can reduce the likelihood that older workers are hired and offered training or promotions.

In an examination of this question, Gordon and Arvey (2004) conducted a meta-analysis of lab and field studies investigating the relationship between age and personnel evaluations. Results obtained based on 39 studies conducted between 1963 and 1998 showed a small but significant estimated true score correlation between age and personnel evaluations (weighted by sample size) of r= -0.11. As expected, younger individuals received more positive evaluations than older individuals did. Perhaps more importantly, however, Gordon and Arvey found that several variables that significantly moderated this relation. First, year of publication significantly moderated the mean effect size such that less age bias was found in more recent studies. Second, age basis was moderated by worker category such that age bias was more negative for job applicants than job incumbents. Third, age bias was greatest when only limited information was provided about either the job or the target individual. Based on these findings, Gordon and Arvey suggested that negative age bias appears to be "less of a problem today than it was in previous decades" (p. 485). They noted, however, that the negative effects of age stereotypes on personnel decisions appears to depend on the extent the decision maker possesses information on the individual and the job necessary for making judgments of person-job fit and the extent to which the decision maker utilizes stereotypes in forming judgments and evaluations. Gordon and Arvey's findings also imply that organizational personnel may engage in suboptimal motivational practices for older workers because of employing age stereotypes when considering the match between the individual and perceived requirements of the job. For example, managers may perceive an older worker as less capable for new learning and consequently evaluate the individual as less suitable for a position that requires adaptability or new skill learning.

The conceptualization of age bias in terms of personjob fit or lack of fit suggests several new directions for additional study on work motivation. Panek, Staats, and Hiles (2006), for example, examined occupations in terms of college student perceptions of perceived cognitive/intellectual, physical, sensory-perceptual, and perceptual motor demands for occupations. Using cluster analytic techniques, Panek et al. identified four occupational clusters, described as high risk, professions, skilled trades, and white collar. Jobs in the high-risk cluster were characterized by relatively high physical and by relatively lower cognitive demands and included positions such as police officer and firefighter. Occupations in the professions cluster required higher levels of education and tended to place high demands on cognitive processes and low demands on physical abilities. Examples of jobs in this cluster include airline pilot, dentist, and college professor. Jobs in the skilled-trades cluster including plumber, chef, and industrial painter consisted of work roles that involve some specialized training, moderate demands on perceptual-motor skills, and relatively fewer perceived demands on cognitive abilities. Positions that comprised the white-collar cluster including jobs such as bank teller, sales associate, and word processor were rated as placing high demands on cognitive and perceptual-motor abilities and low demands on physical abilities.

In a second study, Panek et al. (2006) had college students rate the perceived recommended retirement age and perceived optimal performance age for the occupations that comprised each cluster. Results indicated a significant correlation between recommended retirement age and perceived optimal performance age for occupations in the highrisk and profession clusters but not in the skilled-trades or white-collar clusters. Consistent with expectations, occupations in the high-risk cluster were perceived to have a lower recommended retirement age than occupations in the professions or white-collar occupations were but were not significantly different from the skilled trades. With respect to optimal performance age, perceived optimal performance age was lower for persons in the high-risk and skilled-trades cluster occupations than it was in the white-collar and professions occupations.

Panek et al.'s (2006) findings have two important implications. First, the results indicate that at least among younger adults, distinct, age-related norms for optimal performance and retirement exist. Second, these age-related norms are associated with the perceived cognitive, perceptual-motor, and physical abilities demands of the job. On one hand, these results suggest that age-related norms for performance and retirement are not capricious but rather correspond, at least in part, to maturational patterns in adult development and perceived task demands. On the other hand, however, the reliance on age-related norms in personnel evaluations may serve to attenuate managerial efforts to take account of worker-specific performances and/or dampen managerial initiatives to improve person-job fit by role restructuring or to sustain work motivation among capable older workers. Further research to examine the generalizability of age-related norms for performance and retirement among persons in different age groups and with more extensive job knowledge is needed.

Another approach to understanding age influences on work motivation stems from recent work by Treadway et al. (2005) on the moderating influence of age on the organizational politics—job performance relation in three studies. Findings obtained in this indicate that age moderated the relationship between heightened perceptions of organizational politics and job performance. Specifically, they found

a negative effect of politics perceptions for older worker performance but not for younger worker performance. They suggest the moderating effect of age was not likely due to chronological age per se, but rather a result of older workers having endured more organizational stressors than younger workers and, as a consequence, experiencing a higher level of cumulative resource depletion than younger workers. This proposed explanation is consistent with a developmental view indicating a decline in the effort-utility function and suggests that decrements in job performance among older workers in response to organizational stressors may be in part related to cumulative motivational losses over time.

Results of several surveys indicate that older workers also perceive themselves at a distinct disadvantage in the workplace due to their identification as an older worker. As a consequence, these workers may be less motivated and more easily discouraged in seeking employment and training opportunities than workers in other age groups are. However, Garstka, Schmitt, Branscombe and Hummert (2004) found a more complex pattern with respect to perceived age discrimination and age group identification. Specifically, they found that older persons reported less age discrimination than younger persons did across life domains. Further, perceived age discrimination in general was positively related to age group identification and psychological well-being for older adults, but not for younger adults. Although this study did not focus on workplace events, the results do suggest that additional research is needed to examine whether higher levels of age group identification and interaction among older workers may confer a positive, compensatory influence on work motivation in the face of perceived age bias.

AGING, WORK MOTIVATION, AND SUCCESSFUL ADAPTATION

Emerging theory and research on the influence of aging on work behaviors and outcomes suggests a complex picture with respect to both motivation and work outcomes. Early investigations, building largely on advances in cognitive aging theory and research, focused on the implications of developmental decline in cognitive abilities for job performance. Although developmental decline in select cognitive processes was associated with decline in some jobs, evidence quickly accumulated that other age-related changes in knowledge, skills, and job relevant traits such as dependability are positively associated with job performance. These two opposing processes are probably responsible for the findings of a near-zero correlation between age and performance (e.g., see Cleveland & Landy, 1981). As a consequence, contemporary formulations of work and aging have adopted a more flexible fit perspective, in which the impact of age on job performance is viewed as best evaluated in terms of the fit between age-related changes in the individual and work role demands.

An individual's motivation for work and motivation in the workplace has long been regarded as a critical factor in career success and effective job performance. The graying of the workforce and concerns about future labor shortages have spurred organizational personnel to consider how adult development and age-related experiences may influence motivation for work and best practices for motivating older workers. In this section, we consider implications of recent theories and research for basic personnel selection, training, and management functions.

Motivation for Work: Recruitment

Workforce trends suggest an increasing number of older workers will continue to seek new and "bridge" retirement positions over the next few decades. From an organizational perspective, interest in this segment of the workforce poses both challenges and opportunities. Consistent with research findings that show older persons to be more agreeable, more reliable, and more effective in emotion regulation than young adults are, employers in customer service industries have shown increased interest in hiring older workers for positions such as food service worker, call center worker, and cashier. The typically lower pay and reduced health-care benefit levels associated with these jobs, however, often represents a strong disincentive for older workers.

From a motivational perspective, an individual's decision to participate in the labor force is affected by two major factors: (a) personal resources and attitudes and (b) institutional and economic conditions (cf. Warr, 2001). Among individuals who have sufficient financial resources, motivation for employed work is likely to be the individual's beliefs about the perceived benefits of the work role. Consistent with adult development formulations, midlife and older workers are more likely to focus on the intrinsic and immediate benefits of work rather than on the extrinsic and long-term benefits. Specifically, among older workers, motivation to participate in the workforce is likely to be strongly affected by the extent to which the job is perceived as fulfilling experiential and security goals rather than instrumental motives for upward mobility or career progress. Consistent with this view, job characteristics that have been identified as particularly attractive for midlife and older workers include security, health benefits, flexible work schedules, and opportunities for control over work assignments. Such characteristics emphasize the utilization of existing knowledge and skills and promote a positive sense of self.

Training

Several studies show that older workers tend to learn new job related skills more slowly than younger workers do (see Kubeck, Delp, Haslett, & McDaniel, 1996). Such findings appear to have often been used to explain why older workers may be more reluctant to engage in employee development activities and used to suggest that older individuals are disinclined to undertake new skill learning. However, other studies suggest a more complex picture of the relationship between age and skill training. For example, Warr and Birdi (2003) found that the age-related decline in voluntary development activities could be fully accounted for by individual differences in learning motivation and education. Older workers with more education and higher learning motivation engaged in similar levels of voluntary skill development as younger workers. Similarly, Maurer, Weiss, and Barbeite's (2003) findings indicated that reluctance to engage in new skill learning among older workers may be associated with evaluation apprehension and/or perceived incompetence in using new training technologies. These results suggest that age-related differences in speed of new skill learning should be distinguished from the influence of individual and situational variables that may facilitate or hinder motivation for skill training. Interventions to enhance motivation for skill learning and training effectiveness include, for example, the use of self-paced learning schedules that de-emphasize age-related changes in learning speed, training formats that permit active participation in the learning process and exploratory task learning, cooperative and collaborative training methods that embed learning in a positive social context, the use of structured part-task and subgoal training methods to reduce memory load, and the provision of more highly valued short-term incentives for learning and transfer.

Managerial Practices

To date, very few studies have examined the efficacy of different managerial and leadership practices as they influence work motivation among incumbent older workers. In a series of laboratory studies investigating age-related differences in goal setting on memory tasks, West, Thorn, and Bagwell (2003) found that no significant age differences in the motivational effectiveness of goal setting techniques when goals did not disadvantage older adults. In particular, older adults showed higher levels of persistence than younger adults when goals were relevant and challenging, and feedback emphasized positive progress. These results suggest that goal-setting approaches to improving performance remain an effective managerial practice for older workers when goals and feedback are appropriately tailored.

Maturational patterns further suggest that managerial and leadership practices to sustain work motivation among midlife and older workers must take into account developmental changes in motives and incentives for action. Increased interest in skill utilization at midlife suggests that motivation among older workers may be enhanced by task assignments that involve transmission of knowledge to others, for example, in the form of mentoring. Similarly, the use of social incentives in the form of peer recognition awards rather than monetary or promotional rewards for high levels of performance may be more effective in

motivating older workers. Findings obtained by Treadway et al. (2005) on the moderating influence of age on the politics-performance relation also suggest that managerial practices that provide older workers with opportunities for resource replenishment, in the form of directed project assignments and leaves for accomplishment of community outreach objectives of organizational relevance may also be beneficial to work motivation. Additional research to evaluate these and other innovative managerial practices for their influence on enhance sustained work motivation and performance among midlife and older workers are sorely needed.

Role Transitions and Termination

In previous centuries, retirement was associated with a complete withdrawal from the workforce. Increasingly, however, older workers show a more gradual disengagement from work, involving transition into bridge retirement positions that may include a restructuring of the work role or movement into a different work role altogether. From an organizational perspective, the transition to bridge retirement positions affords a unique opportunity for maximizing the contribution of effective older workers and maintaining positive attitudes toward the organization. Effective organizational practices to maximize motivation through role transitions and retirement are likely to involve a combination of supervisory practices and incentive systems that enhance worker percepts of control and well-being. Supervisor practices that facilitate perceptions of procedural fairness may be particularly important for sustaining work motivation through the transition process in situations characterized by declining worker performance.

SUMMARY AND FUTURE DIRECTIONS

Successful accommodation to the growing proportion of midlife and older workers represents an unprecedented challenge in contemporary organizations. Although scientific progress in the study of developmental changes associated with aging provides critical information about age-related changes within individuals, relatively little research has been conducted on the processes by which these changes influence work motivation and performance. However, research to date provides no evidence to support the notion of a universal decline in work motivation among midlife and older workers. Rather, recent work suggests that the effects of an individual's age on work motivation reflects the complex interplay of three major factors: (a) changes in the person's abilities, knowledge, skills, interests, and motives relative to job demands and opportunities, (b) agerelated attitudinal, normative, and behavioral communications between supervisors, coworkers, and the older worker, and (c) organizational flexibility in policies and practices that enable work role restructuring to maintain an effective fit between person capabilities and job demands. In other words, the influence of aging on work motivation appears not to stem from chronological age per se, but rather from age-related changes in the person, the context, and the work role. Across the life span, maturational changes in intellectual abilities, job-related knowledge, interests, and motives alter the intrinsic value of various incentives for effort expenditures at work. Age-related increases in job-related knowledge and effort may partially compensate for declining cognitive and physical abilities but may be ultimately insufficient for sustaining motivation or performance in work roles that place high demands on age-sensitive abilities. In contrast, for older workers performing jobs that place strong demands on existing knowledge and skills, motivational deficits may occur as a function of boredom and the perceived lack of opportunity for personal growth and development associated with higher levels of performance. In both situations, organizational practices that permit restructuring of the work role to accommodate age-related changes are essential for sustaining work motivation.

The effects of aging on work motivation are also importantly influenced by the social context in which work occurs. Communication of age-related norms for expected benefits from learning and performance, and supervisory use of age stereotypes in personnel decisions pertaining to performance evaluations and employee development readiness exert negative informational and affective influences on worker motivation. Generational differences in values related to different strategies for work accomplishment may also create conflicts that reduce motivation by creating percepts of "outsider" status among older workers. Although recent findings suggest that overt age bias in personnel decision making may be on the decline, additional research is needed to identify the informational and affective pathways by which supervisory and routine interpersonal communications with coworkers may influence work motivation among midlife and older workers.

Interest in developing organizational strategies directed toward enhancing motivation among older workers is on the rise. Over the past few years, a growing number of companies have implemented new programs aimed directly at increasing and retaining older workers. Some programs, for example, offer opportunities for altering the work role using temporary assignments that provide novel opportunities for skill utilization. Other programs emphasize the use of agegraded incentives for worker participation in development activities. Yet other programs emphasize training supervisory personnel in the avoidance of overt and covert age bias in personnel decision making. Such programs appear promising, and they should be systematically evaluated in terms of identifying the program features that most importantly influence older worker motivation and work outcomes.

In modern societies, individuals may spend 5 or more decades of life engaged in organized work. An individual's work contributes to sense of identity and personal well-being and provides the context in which many major life ob-

jectives are accomplished. From an individual perspective, work motivation among older persons can be reasonably considered as an important determinant of social adjustment and psychological well-being. Among employed older workers, a decline in work motivation may be brought about by conflicting demands for effort expenditure in nonwork domains of life and/or by perceptions of declining utility for sustained effort investment to the job. Organizational policies and practices that reduce work/nonwork conflicts and increase the perceived value of job effort can be expected to enhance work motivation. From an organizational perspective, work motivation among older workers also represents a critical issue for sustaining competitive advantage in human capital. Future research, to investigate the impact of specific organizational practices and interpersonal communications in the context of maturational change, represents an exciting and useful direction for advancing the study of work motivation, organizational effectiveness, and public policy.

REFERENCES AND FURTHER READINGS

- Ackerman, P. L. (1996). A theory of adult intellectual development: process, personality, interests, and knowledge. *Intelligence*, 22, 229–259.
- Ackerman, P. L. (2000). Domain-specific knowledge as the "dark matter" of adult intelligence: Gf/Gc, personality and interest correlates. *Journal of Gerontology: Psychological Sciences*, 55B(2), 69–84.
- Beier, M. E., & Ackerman, P. L. (2001). Current events knowledge in adults: An investigation of age, intelligence and nonability determinants. *Psychology and Aging*, *16*, 615–628.
- Beier, M. E., & Ackerman, P. L. (2003). Determinants of health knowledge: An investigation of age, gender, abilities, personality, and interests. *Journal of Personality and Social Psychology*, 84(2), 439–448.
- Cleveland, J. N., & Landy, F. J. (1981). The influence of rater and ratee age on two performance judgments. *Personnel Psychology*, *34*, 19–29.
- Carstensten, L. L. (1998). A life-span approach to social motivation. In J. Heckhausen & C. S. Dweck (Eds.), *Motivation and self-regulation across the life span* (pp. 341–364). New York: Cambridge University Press.
- Cattell, R. B. (1971). *Abilities: Their structure, growth, and action.* New York: Houghton Mifflin.
- Forte, C. S., & Hansvick, C. L. (1999). Applicant age as a subjective employability factor: A study of workers over and under age fifty. *Journal of Employment Counseling*, 36, 24–35.
- Garstka, T. A., Schmitt, M. T., Branscombe, N. R., & Hummert, M. L. (2004). How young and older adults differ in their responses to perceived age discrimination. *Psychology and Aging*, 19, 326–335.
- Gordon, R. A., & Arvey, R. D. (2004). Age bias in laboratory and field settings: A meta-analytic investigation. *Journal of Applied Social Psychology*, *34*, 468–492.
- Kanfer, R. (1987). Task-specific motivation: An integrative approach to issues of measurement, mechanisms, processes, and determinants. *Journal of Social and Clinical Psychology*, 5, 237–264.

- Kanfer, R., & Ackerman, P. L. (2000). Individual differences in work motivation: Further exploration of a trait framework. *Applied Psychology: An International Review*, 49, 470–482.
- Kanfer, R., & Ackerman, P. L. (2004). Aging, adult development, and work motivation. Academy of Management Review, 29, 440–458.
- Kanfer, R., Chen, G., & Pritchard, R. D. (in press). *Work motivation: Past, present, and future*. Mahwah, NJ: Lawrence Erlbaum Associates.
- Kehr, H. M. (2004). Integrating implicit motives, explicit motives, and perceived abilities: The compensatory model of work motivation and volition. *Academy of Management Review*, 29, 479–499.
- Klein, H. J., Austin, J. T., & Cooper, J. T. (in press). Goal choice and decision processes. In R. Kanfer, G. Chen, & R. D. Pritchard (Eds.), Work motivation: Past, present, and future. Mahwah, NJ: Lawrence Erlbaum Associates.
- Kubeck, J. E., Delp, N. D., Haslett, T. K., & McDaniel, M. A. (1996). Does job-related training performance decline with age? *Psychology and Aging*, 11, 92–107.
- Maurer, T. J., Weiss, E. M., & Barbeite, F. G. (2003). A model of involvement in work-related learning and development activity: The effects of individual, situational, motivational, and age variables. *Journal of Applied Psychology*, 88, 707–724.
- McAdams, D. P. (2001). Generativity in midlife. In M. E. Lachman (Ed.), *Handbook of midlife development* (pp. 395–443). New York: John Wiley & Sons.
- Panek, P. E., Staats, S., & Hiles, A. (2006). College students' perceptions of job demands, recommended retirement ages,

- and age of optimal performance in selected occupations. *International Journal of Aging and Human Development*, 62, 87–115.
- Roberts, B. W., Walton, K. E., & Viechtbauer, W. (2006). Patterns of mean-level change in personality traits across the life course: A meta-analysis of longitudinal studies. *Psychological Bulletin*, 132, 1–25.
- Schaie, K. W. (1996). *Intellectual development in adulthood: The Seattle longitudinal study*. New York: Cambridge University Press.
- Schmidt, F. L., Hunter, J. E., & Outerbridge, A. N. (1986). Impact of job experience and ability on job knowledge, work sample performance, and supervisory ratings of job performance. *Journal of Applied Psychology*, 71, 432–439.
- Treadway, D. C., Ferris, G. R., Hochwarter, W., Perrewe, P., Witt, L. A., & Goodman, J. M. (2005). The role of age in the perceptions of politics-job performance relationship: A three-study constructive replication. *Journal of Applied Psychology*, 90, 872–881.
- Waljee, J. F., Greenfield, L. J., Dimick, J. B., & Birkmeyer, J. D. (2006). Surgeon age and operative mortality in the United States. *Annals of Surgery*, 244, 353–362.
- Warr, P. B., & Birdi, K. (1998). Employee age and voluntary development activity. *International Journal of Training and Development*, 2, 190–204.
- West, R. L., Thorn, R. M., & Bagwell, D. K. (2003). Memory performance and beliefs as a function of goal setting and aging. *Psychology and Aging*, 18, 111–125.

FAMILY-FRIENDLY ORGANIZATIONS

Lizabeth A. Barclay

Oakland University

ccording to Friedman and Greenhaus (2000), there is increasing interest in family-friendly organizations by society. Family-friendly organizations offer employees options that allow them to balance their work and family roles. These options can include flexible scheduling, family-oriented benefits such as child care, and work location flexibility. Organizations that develop family-friendly programs hope these practices will help the organization accomplish its goals. Before starting programs, organizations usually investigate the cost-benefit analysis of both tangibles and intangibles in implementation. For example, some of the proposed benefits of family-friendly programs include a more committed workforce and lower turnover. Possible costs of implementation include coordination of the programs, costs associated with purchasing additional equipment, and resistance on the part of other employees including managerial staff.

Because family-friendly organizations are interested in reducing stress for employees balancing multiple roles as well as developing a committed workforce, they may be culturally different from organizations without this focus. Laycock (2003) wrote that some executives believe that work-life programs are fluff. She suggested that executives who hold this belief will continue to manage their organizations in a more traditional way that communicates that family issues are not work issues. Even if an organization implements some family-friendly programs, she indicated that the behavior of upper level managers can send a message that suggests to employees that they should not participate. An example she offered is that of the executive who arrives first and leaves last. Even if the organization had a family-friendly policy related to working hours, the

executive's behavior would convey a message of what the organization actually values.

Friedman and Greenhaus (2000) attributed increased interest in family-friendly programs to the gender equity movement, as well as to societal changes that reflect awareness of how work and personal roles shape each other. According to Wharton (2006), work, family, and gender were historically linked. The way people think about work—for instance, what they believe is appropriate work for certain people—and how work and family link, have become increasingly popular topics of research and debate.

Wharton (2006) indicated that in the beginning of the 20th century, women and children moved out of the U.S. labor force, and it became predominantly male. Prior to this, work and family were not as segregated because of the dominance of the agricultural economy. However, she stated that as industrialization occurred, society seemed to embrace the idea that men were workers and women were caregivers. Hence, in a family, men would focus on paid work and not deal with work in the home, which then became the focus for women. This of course, was not true for all families or women. However, the separation of tasks mentioned previously becomes important when trying to understand the modern work-life balance movement and its implications for organizations. Many of the familyfriendly programs seen today specifically accommodate or support women workers in their return to paid work. While more organizations are attempting to make these programs gender neutral, male employees for a variety of reasons, do not participate at the same rate as women. Whether this will change in the future is also a topic of debate. Some writers (e.g., Laycock, 2003) suggest that males may become more aware of the need for such programs in the future. Upper level executives for the most part, did not have to deal with child care at the beginning of their careers to the same extent as their wives. Some authors suggest that men will become more aware of caregiving responsibilities as their own parents age.

Wharton (2006) also believed that besides defining men and women's roles in the early 1900s, society also embraced new scientific ways of working. With new management techniques, job design and activities at work were controlled in ways that they had not been earlier. Specific job descriptions were developed, hierarchies of authority were established, and time spent working was closely monitored. Many organizations promoted the idea of a fair day's work that implied that the employee labored without interference from the nonwork sphere (home and family). Wharton believed that these cultural beliefs even had an impact on the study of work over a number of decades. The perceived dichotomy between work and home led to research that did not examine the interrelationship between the two for many years. Some researchers studied life at home; others studied life at work. There was not a lot of overlap.

Wharton (2006) stated that toward the end of the 20th century as more women entered the workforce, the feminist movement questioned existing research paradigms, and the economy of the United States switched to a service rather than an industrialized base. All of these changes provided the framework for what we consider family-friendly practices. The workforce has become increasingly diverse in gender, family type, and ethnicity. An increasing number of individuals have begun to consider how work affects their ability to be a parent or even an involved member of society at large. In addition, the popular press has indicated that young workers without children, both male and female, desire more balance in their lives. These changes are occurring at the same time that organizations in the United States are facing global competition. Organizations must be attentive to their environments in order to survive. One organization response to competition is working harder. For example, Rapoport, Bailyn, Fletcher, and Pruitt (2002) reported that the U.S. workforce spends more time at work than workers in other industrialized countries do. Time is a fixed quantity. More time spent at work means less time available for nonworking roles. Given the interest in family, personal time, and careers, what can organizations do to remain responsive to their employees' needs and remain productive? One option pursued by organizations, is the development of family-friendly programs and policies. This chapter discusses common programs. These programs will also be put in the context of open systems theory to provide a framework for understanding the development of these programs, the response by employees to the programs, and finally to the impact of family-friendly policies on the actual work of the organization.

Beyond this chapter and research, family-friendly programs have also become a popular topic in the media. The

Wall Street Journal for example, has a regular column on work and family. Working Woman and Working Mother magazines regularly identify the best organizations for working women. Finally, work-family issues play a role in Fortune magazine's annual best companies to work for list. Specifically, Fortune not only lists the best companies with the best work-life balance, but also details the organizations with the best child-care and telecommuting programs. Because of continuing media attention, it is highly likely that an increasingly large group of organizations will consider work-life balance programs.

AN OPEN SYSTEMS VIEW OF WORK AND FAMILY

In order to understand how the interaction of work and life has lead to family-friendly practices, the seminal work by Katz and Kahn (1978) on the open system approach to organizations is very helpful. The open system model suggests that organizations interact with their environments. Each organization receives inputs from the environment, transforms these inputs in some way, and then produces output to the environment. The organization, by the nature of this transaction process, has a permeable boundary. Organizational boundaries in this sense are not necessarily physical; the boundary determines who is inside and who is outside the organization. This is very relevant to the family-friendly organization movement. Organizations have historically considered the family to be outside the organization. However, research on roles and stress suggest that roles and their associated expectations carry over boundaries.

In open systems theory, inputs could be employees, capital, or raw materials. Once these inputs enter the organization they are transformed to help produce a product or provide a service. The transformation involves the participation of employees in sets of interrelated roles defined by the organization. The transformation results in a product or service that is output to the environment. A familiar organization, the university, helps provide a framing example for open systems theory. Inputs for a university include students, faculty, and funding. For universities, one transformation process is educating students; another transformation process is the development of new knowledge through research. Students enter the university with one level of knowledge and leave with another. Professors conduct research, write papers, and invent new technologies in the other transformation process. Outputs for the university with regard to these two transformations would be educated citizens (the new alumni) and research discoveries.

Someone hired or admitted from the environment assumes a role within the organization. This role is defined through job descriptions, student conduct codes, and expectations sent by others within the system. Why is the open systems framework useful for understanding work-family interface? As indicated in the first section, individuals have

roles both inside and outside the organization. It is difficult, if not impossible to check your other role at the door when entering the other organization whether it is the work organization or the family.

Many modern work organizations try to structure their organizations to engage or involve members. Employees committed to the goals of the organization are believed to produce higher quality goods or services. In order to engage employees, the organization may reward or punish certain behaviors. It is not unusual for the cultures of many organizations to communicate extensive involvement through long work hours, travel, and expectations of employees to work in the evening at home. Other organizational messages conveying commitment demands could include mandatory socializing during family time, participating in company sports teams during nonworking hours, or even working every weekend. From a family-friendly perspective, this involvement is in conflict with other roles the employee has such as spouse, child, and parent, or even as an individual who is not in his or her work role. There is only a fixed amount of time each day. Additional time in work roles leaves less time for nonorganizational roles.

To understand this conflict of roles, the concept of partial inclusion is helpful. Katz and Kahn (1978) said that partial inclusion suggests that only part of a person is involved in any social system. They suggested that when work organizations recruit, they need that employee to put aside the parts of their identity that are not organizationally relevant. If an employee behaves according to a nonorganizational role while at work, problems could develop that impact the transformation process. For example, what if all employees who were parents randomly left work to visit their children's schools during the workday? This would be problematic for the organization: work might not be completed, customers may become angry, and the organization itself may be threatened.

Beauregard (2006) similarly stated that conflict can result when individuals have multiple incompatible roles. This does not mean that you cannot be a spouse or parent and an employee, but it does suggest that conflict can occur if roles demand we do different things at the same time. In the university example, students are supposed to attend class, complete projects, and take exams. Faculty are expected to teach, grade, do service, and contribute to knowledge through research. However, these are not the only roles assumed by those individuals. How could other roles of students or faculty result in conflicts and problems within the university? Consider the following scenarios that illustrate work-family role conflict. A female faculty member has a baby in the middle of the semester and cannot attend class. While the department chair understands about medical leave, he or she may wonder why the faculty member did not plan the baby for a nonteaching term, and wish she would return to the classroom quickly. The students in the class could become dissatisfied because they may have many substitute instructors. Conversely, suppose a student

finds he or she has to deal with an acutely ill aging parent during the semester. If you are the instructor, you might make an accommodation that does not seem to disadvantage the rest of the class. This could become problematic if the class involved team projects. How does the team respond to the student not fulfilling project obligations, since the team also has expectations about what the missing student should be doing? Finally, suppose you are the single parent of a small child, and are teaching or attending a night class on the same evening as a very important school recital. Your child begs you to attend. Do you go to class, or do you go to the recital? All these situations demonstrate the challenges of multiple roles for individuals and organizations. Each decision made can influence the organization, other members of the organization, and the organizational transformation process. In some cases, the organization member might engage in substandard performance, develop poor attitudes about the organization, or even leave the organization. For example, if a professor repeatedly cancels classes because of a new baby, students might become angry. In addition, even if class is not missed, professors may be perceived by others in the university as not being committed to research if they are not in their office or lab on the weekends. If professors start to perceive that the organization is not supportive of their new role, they might start looking for jobs where they can fulfill multiple roles.

The university example is not much different from experiences at other organizations. Some for-profit organizations require employees to travel over a weekend for cheaper airfare. Being away from family on Saturday and Sunday could lead to role conflict. Other organizations expect employees to be available via e-mail, computer, or cell phone while on vacation. Expectations about roles develop within social systems. These role expectations often drive the culture of that particular organization. In recent years, many organizations have stated that they are high commitment. Is this statement itself in conflict with being a family-friendly organization?

Beauregard (2006) reported that with more and more families consisting of either dual-income or single parents, conflict between work and family roles has "reached a crisis" (p. 336). As indicated earlier, these conflicts could result in increased absenteeism, turnover, less job involvement, and less attendant satisfaction. Family-friendly organizations recognize these role conflicts and attempt to find ways to resolve these conflicts so that individuals can fulfill multiple role expectations and remain committed to the employing organization. Organizations that recognize that their environments are changing might be more likely to adopt such practices. Environmental changes could include more women in the workplace who are balancing work and family, a greater societal emphasis on family and children in general, perceived generational differences in work commitment and motivation, and even all those articles on the best places to work. Open systems theory proposes that organizations need to recognize and respond to these environmental changes.

Such response can lead to changes within the organization involving structure, reporting relationships, and even how or where work is done. Thus, by modifying role expectations, new programs and policies could facilitate member retention and organizational image.

FAMILY-FRIENDLY PRACTICES

The types of family-friendly practices that organizations can adopt vary depending on the work culture, the types of jobs in the organization, and the types of benefit packages the organization provides to employees. This section discusses a variety of practices. They are organized into schedules, location, and benefits. While these are discrete categories, there can be overlap between these types of practices within an organization. Not every family-friendly organization adopts all options. The family-friendly solution for any given organization must take into account the environment, organizational goals, and the organization's transformation process.

Family-Friendly Practices: Work Schedules

Organizations can offer a variety of family-friendly practices that relate to when employees work. Among the most common practices are flexible scheduling or flextime, compressed workweeks, part-time employment, and job sharing. At one time, many work hours were rigidly set. Individuals working during the day, put in time nine-tofive or some close approximation to those hours. Hourly employees often used time clocks and had their salaries docked for tardiness. In manufacturing environments, employees may have worked different nonoverlapping shifts so that the organization could continue producing its product around the clock. Cohen and Gadon (1978) indicated that as demographics changed in the United States, there was a call for more flexibility and individual employee control over the hours of work. This call is related to the changing nature of work, the increased educational level within many workplaces, and the increased participation of women in the U.S. labor force. In this section, family-friendly practices related to the hours an employee works are discussed. Many organizations consider schedule options family-friendly practices. Keep in mind that not all scheduling options are appropriate for all work situations. The nature of the job itself may preclude certain scheduling options.

Flexible Scheduling/Flextime

Suppose you are working a traditional nine-to-five schedule and you need to visit your doctor. If you are lucky, your doctor may have early morning or evening hours. However, many doctors do not, and in order to schedule this visit you will have to take off from work. This absence could be paid or unpaid depending upon the policies of your employer.

Similarly, suppose you are a parent of a small child. Your child's class is going on a short field trip during the last part of the school day. Once again, this is during your normal working day. You might not get permission to leave early, and in some cases, you may need to take the entire day off as a personal day. In both of these examples, the employee may lose money by taking a day off, and the employer could lose productivity. How does flexible scheduling address these concerns?

Flexible scheduling allows an employee, in conjunction with the employer, to set more flexible work hours. Generally, flexible scheduling is not ad hoc, and requires some degree of coordination to ensure that critical organizational goals are accomplished. An organization that offers a flexible schedule typically expands the range of hours that an employee can choose to work. This means that within the new parameters, an employee could arrange to come in to work early and leave early, or could come in late and leave late. If an organization had traditional nine-to-five working hours, a flextime policy might expand the range of possible work hours, or bandwidth, from 6 a.m. to 6 p.m. Using the examples at the beginning of the section, this would allow someone to make a doctor's appointment or go on a field trip with a child by flexing their hours earlier or later. In some organizations, there are hours all employees must be present; these are referred to as core hours. Cohen and Gadon (1978) indicated that the need for core hours is dependent on the degree of interdependence of workers. If employees need to coordinate with others on a semiregular basis, the core hours can be used to do so. In an organization where extensive interaction is needed, or where work is done in a sequential manner, flextime may not be a good option. For example, an assembly line needs the entire shift to be present to assemble the product. Employees would not be able to stagger their arrival in this sort of situation.

Cohen and Gadon (1978) also suggested that the use of flextime can accrue benefits to society in general. If working times are staggered, individuals will spend less time commuting. This can have the added benefit of less gasoline consumption and attendant pollution.

In some organizations, managers resist the implementation of flextime. They believe that they must be personally present during the entire bandwidth to supervise their subordinates. Usually when this occurs, there is some underlying trust issue within the organization. If an organization believes that employees must be closely monitored, flextime is not a good option. An effective flextime program should not require managers to significantly increase their working hours.

Compressed Workweeks

The 5-day week, generally Monday through Friday, has become the standard in much of the United States. In the early part of the 1900s, many employees worked 6 or more days per week. Changes to the 5-day week are a result

of legislation and union activity in the early part of the 1900s. A compressed workweek takes the hours worked in a standard week and compresses them into a shorter period. Compressed workweeks are considered full-time employment schedules. Instead of 5 days, employees may work 3 or 4 days and remain a full-time employee. Cohen and Gadon (1978) stated that this arrangement is a trade off. The employee gets more days off from work but has to work longer on the days he or she is present. Two very popular options in compressed workweeks are the 4–40 and the 3–36 schedules. On a 4–40 schedule, an employee will work 4 days for 10 hours each day. Similarly, in a 3–36 schedule, an employee works 3 days a week for 12 hours per day. In both of these situations, the employee works full time and receives the requisite organizational benefits.

Some organizations use compressed workweeks as recruiting tools. For example, many hospitals have nursing shortages. Nursing is a female-dominated field, and women who pursue this career may have child-care responsibilities. By offering a compressed workweek, these nurses can have full-time jobs as well as significant time off for family. Hospitals are staffed 7 days a week, so nurses may be able to arrange their compressed workweek to maximize the ability to find or share child care. This is a good example of how an open systems approach allows you to consider your environment and get important resources (nurses) from it.

During the change from year 1999 to 2000, many organizations needed to recruit computer programmers to deal with the Y2K problem. Programmers were in high demand. By offering compressed workweeks, some organizations were able to recruit programmers under this alternate schedule to meet their Y2K needs. Cohen and Gadon (1978) indicated that a compressed workweek can allow individuals who currently have a full-time job to moonlight with a second full-time job.

Not all organizations function 24/7 as hospitals do. If an organization pursues a compressed workweek option, they would have to consider a number of issues. These include employee fatigue, the structure of work, and the costs of extended facility downtime. Even though an organization may be able to design a job within a compressed framework and recruit employees to work the schedule, they will have to consider how effectively a person can work during an extended period of time. Is the job one that will result in significant fatigue during the last part of the shift? If so, this may not be the best work schedule for that particular job. In addition, the organization might consider whether it is possible to implement a compressed schedule throughout the facility, thus giving all employees an extended weekend. If some employees get more days off, the other employees may find the policy unfair. Additionally, if an organization does implement a compressed workweek, they must consider whether this change will cause difficulties for their customers during the off days. This is certainly an environmental interaction issue within the open systems approach. One possible option in this case is to stagger

the compressed workweeks so that there are employees available during traditional times. Lastly, the organization should consider the cost of shutting down and restarting the facility when investigating this option.

Part-Time Employment

While career planning often envisions a full-time position, one career strategy sometimes used by individuals with children, those transitioning into retirement, or individuals with other significant commitments is part-time employment. Part-time employment involves a reduction in the number of hours worked per week. According to Gottlieb, Kelloway, and Barham (1998), reductions could be as little as a 10% reduction or as much as 50%-60% in the hours worked per week. For example, an employee may be involved in a very demanding community service assignment such as developing a city charter. He or she may request a 10% reduction of hours for a period of time to complete this outside obligation. At the end of the project, the individual would return to 100% or full-time status. In another example, a working parent with a small child may only wish to use day care 3 days a week. This person could request a reduction in hours and work only while the child is attending a day care center. As the child matures, and spends more time in school, the parent may request a return to full-time status given the staffing needs of the employer. Not all employers would like to have large numbers of part-time employees; other employers may find this staffing option consistent with their goals. If there are part-time employees, organizations generally prorate benefits based on the percentage work reduction. Some organizations may eliminate certain benefits for part-time employees.

Higgins, Duxbury, and Johnson (2000) reported that part-time employment as a staffing strategy has grown over the past 20 years. They also reported that women constitute a majority of those in part-time positions. It may be that male employees do not find this a career-friendly option. Higgins, Duxbury, and Johnson indicated that there is research that suggests that part-time work can both allow primarily women to balance career and family, and isolate the part-time workers in lower paid nonchallenging jobs.

Job Sharing

In job sharing, two individuals share one job. Of the schedules discussed so far, this is the most uncommon. Organizations generally do not proactively design job sharing opportunities. Many individuals believe that job sharing can lead to career progression problems. In many cases, two individual workers with schedule needs come together and propose a job sharing arrangement to an organization. The schedule itself becomes part of the negotiation between the parties as well as with the organization. The individuals could both work half a day 5 days a week, they could each work half a week, or some other mutually agreeable schedule.

Whatever the particular schedule, the individuals need to communicate effectively and coordinate the job tasks. Even though the individuals theoretically split the time, organizations may actually get more than 50% from each of the employees because of the time spent between the sharers in activity coordination. Any position fringe benefits such as insurance or vacation are generally prorated.

What types of individuals might job share? In many cases, women with small children are those most interested in this option. There have been examples of elementary school teachers job sharing while their children were small. This allows each to keep their teaching certification and professional credentials while having more time to spend with their own children. In a case such as this, both teachers would most likely meet to discuss the development of their students. They might divide assignments by topic area, and they may both attend parent-teacher conferences. As you can see, coordination between job sharing partners is required. It would make no sense for both teachers to assign a social studies project on the same unit. An advantage of job sharing for the school is that if one of the individuals were ill, rather than calling in an unknown substitute teacher, the job sharing partner may be able to work the additional time until the other teacher recovers.

Family-Friendly Practices: Work Location

Siha and Monroe (2006) have written that telecommuting remains of interest to employers as well as researchers. According to these authors, the number of telecommuters in the United States in the early 2000s was about 19 million individuals. They note that other countries also have telecommuters: one million in Canada and smaller numbers in Britain, New Zealand, Singapore, and Finland. The reason for these differences in participation rate could be attributable to a variety of reasons: work culture, living distance from work, level of enabling technology, and the availability of public transportation. Telecommuting is sometimes referred to as telework and the virtual office. In the broadest sense, individuals who telecommute do not have to report to work at a central location. Organizations have also used telecommuting in times of disaster. After a severe earthquake in California damaged roads, it was difficult for individuals to get to work in a timely fashion. Some organizations used telecommuting to maintain productivity until the roads were repaired.

There are many different forms of telecommuting. Gottlieb et al. (1998) indicated that telecommuting can involve working at home, at a satellite office closer to the employee's home, or at a client's office. Telecommuting reduces the employee's time spent commuting to work and theoretically can reduce traffic congestion. Siha and Monroe (2006) reported that if a person had a 30-mile commute (one way) in a major city like Los Angeles, where the average time spent in traffic jams per year is 56 hours, they would spend a total of 400 hours per year or 16 days sitting in their cars!

Hence, if an individual could reduce the amount of time he or she commutes to work, the saved hours could be redirected to fulfilling family or other obligations thereby reducing day care and gasoline costs.

According to Gottlieb et al. (1998), telecommuting is a way to reduce work-family conflict. However, according to Joice and Verive (2006), some employers do not permit employees to telework to facilitate dependent care. The rationale for this exclusion is the belief that trying to provide dependent care in the same location as the telework reduces the quality of both. These authors suggested that empirical research has not been conducted on telework and dependent care problems. Without such empirical work, guidelines concerning best practices in this area are limited. Joice and Verive do report on a federal study concerning this issue. Based on the report, they suggested that organizations take a results-oriented approach to the teleworker rather than voicing concerns about the employee's ability to complete work and provide care. The best practices section of this chapter will revisit results-oriented approaches.

Telecommuting is also a way to help the environment. Siha and Monroe (2006) indicated that organizations with more than 100 employees in states with the worst air quality in the United States were supposed to reduce the number of employees individually commuting by 20% because of a 1990 amendment to the Clean Air Act. In addition to vans and carpooling, two of the practices discussed in this chapter, compressed workweeks and telecommuting, were other ways to meet this target.

Family-Friendly Practices: Dependent Care Benefits

In addition to scheduling options and allowing employees to work from remote locations, there is an increased interest in other benefit options related to managing family or nonwork roles. As mentioned earlier, some organizations consider the scheduling and location options discussed previously to be benefits. This section will discuss some alternatives that do not fall into the previous categories. Many of these options involve financial contributions to the employees' compensation packages. Although this section lists these options separately, they are all types of dependent care options. According to Laycock (2003), over a third of today's workforce consists of working parents with children under the age of 18. In addition, she indicated that almost a quarter of households in this country care for elderly relatives. In some cases, adults must provide care for both their children and their parents or grandparents. These adults, referred to as the sandwich generation, are in the middle of two other generations that need them to provide care.

Child Care

Employer benefit support for child care can take a variety of forms. These include on-site day care, vouchers for child care at other locations, parental leave, and pretax dependent care accounts. Laycock (2003) suggested that organizations investigate the cost-benefit aspects of any of these options before making a decision on implementation.

On-site or Consortium Child Care. On-site child care means just that. The organization, regardless of its core business, starts a day care center at work. Laycock indicated that although on-site child care sounds like a good idea, such centers are not necessarily the answer for any given organization. If an organization were to start an onsite center, they would have to have appropriate space for the center. They would have to decide on the age range of the children who would attend the center. For example, a different staffing level is required for infants than for preschoolers because of many states' licensing requirements. The organization would also have to make sure that the center was secure, that is, the center would be open only to parents or specific staff. In addition, the organization would have to forecast the utilization level of the center. It would be unwise to open a center and have it at best half full. If an organization were considering on-site care, surveys of intent should be conducted with the employee group. If this were not possible, a review of demographics of current employees would be helpful. There are several other issues to consider with this option. For example, if there were excess demand, which employees would get preference in acquiring space in the center? Similarly, what hours of operation would be most compatible with employee schedules?

A consortium center, according to Laycock (2003), involves a group of organizations banding together to build a center that the employees of each organization can use. The organizations may outsource the management of the center and share costs.

Mildly Ill/Backup Child Care. When children are ill, they cannot attend school or regular day care. Schools and day care facilities have rules about illness and under what conditions sick children can return. Because of this, some employers are recognizing the productivity losses associated with parents using sick days to take care of sick children. LoJacono (2001) reported that employed parents miss work between 6 and 29 days each year because of sick children. In order to reduce absenteeism, some employers are investigating mildly ill child care. These child-care facilities are set up to specifically deal with a child who is somewhat under the weather but does not need to go to a hospital. LoJacono said such facilities are more expensive than normal day care because of their special staffing needs (a lower staff-to-child ratio) and the availability of trained medical personnel.

LoJacono (2001) indicated that employers can contract with these facilities for a specific number of spaces a year. The organization would consider the demographics of their organization (number of employees with children below a target age). Generally, the employer pays part of the fee and the employee copays for the visit. Organizations may consider this option in order to reduce the costs associated with an absent employee.

LoJacono (2001) said another related benefit organizations could provide is backup care. There are times when a parent may need to miss work and the child is not ill. Usually these involve occasional days off from school for teacher in-service or development, school holidays, or even when the usual child care provider becomes ill. The employer may have a list of backup facilities or have a relationship with several facilities that could provide services for several children.

Elder Care

According to Timmermann (2006), the 2000s and 2010s will be the elder care decades. Many employees born during the baby boom years (1946–1964) have parents who are over 70 years of age. As people age, they begin to experience greater health problems and possibly limited mobility; therefore, the adult children of these individuals will have to assume caregiver roles. Assuming this role can result in role conflict as discussed previously. O'Toole and Ferry (2002) indicated that this caregiving role has an impact on employers. They classify this impact into categories including absenteeism costs, work disruptions, and replacement costs for workers who quit to provide care to an elderly parent. Although women are generally the primary care providers for small children, Timmermann said men play a more involved role in elder care.

What types of benefits are typically provided in elder care? Some of the benefits discussed by Timmermann (2006) include flexible scheduling and telecommuting. In addition, O'Toole and Ferry (2002) provided a list of other elder-care-specific benefits. These include toll-free call centers, Web sites with information on elder care programs, an organizationally developed list of services and discounts, assistance programs staffed by professionals with geriatric training, referral programs, and benefit services that can be purchased by the employee at a discount. In many cases, employees may not have a large extended family available to assist in care and may not know of services and discounts available to them.

This area will continue to receive media and business interest. The costs associated with the care of the elderly are increasing. These costs as well as the emotional stress of dealing with an aging and ill parent have an impact on the employing organization. O'Toole and Ferry (2002) suggested that organizations with elder care programs can improve stress for their employees with few administrative costs.

OTHER BENEFITS

In addition to the options listed above, some organizations provide a range of other benefits. They can include options such domestic partner benefits, lactation rooms for new mothers, adoption assistance, and school vacation programs. There are of course many other options available to organizations; however, the options listed above give an idea of the range of benefits some employers consider.

Domestic Partner Benefits

Some organizations provide insurance and benefit options to couples who are in committed relationships but who cannot marry. Organizations with these benefits usually require some documentation of a committed relationship. The domestic partner may then be eligible for medical benefits and other benefits such as tuition reimbursement.

Lactation Rooms

As women return to the workforce after having a baby, many choose to continue nursing for health reasons. In the United States, many mothers return to work 6 weeks after delivering a baby assuming the delivery was not problematic. In spite of returning to work, these mothers may wish to choose to continue nursing. If they live a distance from home or the child-care provider, they may not be able to visit the baby during the day. Lactation rooms provide mothers with a comfortable and private location at work to express milk. Refrigerators are provided in order to keep the milk for later use. Prior to the development of lactation rooms, mothers would either have to use restrooms or some other private location at work to do this.

Adoption Assistance

Couples choose to adopt for a variety of reasons: they cannot have biological children on their own; they have space for more children and want to help a child, and so forth. Some organizations now provide assistance for adoption in the form of leave for new adoptive parents.

School Vacation Programs

Once children begin attending school full time, parents may need occasional assistance for times when their children are not in school. School vacation programs may include referrals to summer or break camps or may even involve an organizationally sponsored camp for employees' dependents.

FAMILY-FRIENDLY BACKLASH

Not all employees have children, aging parents, or significant family obligations. Because of this, there has been evidence of a backlash against family-friendly practices by single and nonparent employees. Parker and Allen (2001) suggested that this backlash may have to do with perceptions of unfairness. Rivera (2001) said that childless workers may feel taken advantage of because of the perception

that their personal lives are not as important as those of employees with children. Burkett (2000), supporting this line of thought, reported that single employees may feel pressure to work extra hours to cover for parents who need to pick up children from school, travel more extensively for work than coworkers with children, as well as settle for less desirable vacation times. Finally, Parker and Allen also reported that childless workers are less likely to be able to use flexible scheduling. Using the open systems approach, providing support for a nonwork role to some employees may put other employees at a disadvantage with the organization. This perception could lead single workers to seek employment elsewhere.

From a benefits perspective, Burkett (2000) discussed how many family-friendly policies are actually benefits that the single or childless cannot access. These include but are not limited to on-site day care, parental leave, and day care subsidies. Rothausen, Gonzalez, Clarke, and O'Dell (1998) suggested that benefits that are only available to a subset of employees violate concepts of equity and equality of rewards. Rivera (2001) reported on organizations that have tried to deal with these perceptions by modifying family-friendly policies to life benefits. For example, some organizations allow employees to choose options from a set of benefits. A childless worker may choose tuition reimbursement. An employee with a small child could choose child care. The dollar contribution to benefits would be equal for both employees.

SOME GLOBAL PERSPECTIVES ON FAMILY-FRIENDLY PRACTICES

Much of what has been discussed to this point concerns family-friendly practices in the United States. Organizations in other countries have also addressed these issues. This section presents family-friendly issues in several other countries. Most of the research on family-friendly practices is in developed rather than in developing nations. In addition, family-friendly practices are often linked to gender equity issues; therefore, in countries where women do not have the same rights as men, it is less likely that one would find organizations developing such practices.

Just as in research conducted in the United States, articles on family-friendly practices in other countries focus on work-family balance, the role of such programs in the recruitment and retention of employees, and the actual accessibility of the programs. For example, Schweitzer and Duxbury (2006) reported on telework in Canada. They found that organizations that permitted telecommuting were primarily larger and employed knowledge workers. They indicated that overall there has been modest growth in the use of telework in Canada. Surprisingly, they found that some employees who telecommuted did so at organizations that did not have policies. The authors suggested that this means that workers want to telework and negotiate

parameters with immediate managers rather than wait for a policy to be developed. Schweitzer and Duxbury suggested that there may be organizational barriers that interfere with setting up telecommuting policies.

In another study, Budd and Mumford (2006) examined family-friendly work practices in Britain. They found that even though workplace statistics say that family-friendly practices are available, employees themselves did not perceive that these policies were available to them personally. This is an important point. Organizations may respond to surveys indicating that they have policies. This is not the same as asking employees (the potential policy users) to what extent they believe they can use such policies. As stated earlier, employees receive subtle messages about appropriate role behavior. Budd and Mumford proposed three reasons why there could be a disconnect between policy availability and accessibility. These include policies not being available to all employees, employees not being aware of the benefits, and barriers interfering with accessibility such as financial situation or fear. These certainly are issues that would be of concern in the United States as well as Great Britain. In conclusion, based on analysis, Budd and Mumford suggested that British employers are responding slowly to what the authors perceived as increased societal demand for such programs.

Remery, van Doorne-Huiskes, and Schippers (2003) examined family-friendly policies in the Netherlands. They indicated that while organizations in the Netherlands were slow in responding to such initiatives compared to the rest of Europe, they are now more responsive. They surveyed 871 organizations and found that family-friendly arrangements had become common. They believed that this is because employers know that work-family balance is an important issue for employees.

Finally, Sato (2000) has written about family-friendly policies in Japan. He indicated that such policies are not commonly accepted in the managerial levels of Japanese firms.

FUTURE DIRECTIONS: RESEARCH AND BEST PRACTICES

Konrad and Mangel (2000) stated that because of the interest in family-friendly practices, there is a growing body of research that examines the impact of work-life balance programs on productivity. In addition, books and articles are appearing that provide best practice models. The last section of this chapter will examine these two areas.

Productivity and Family-Friendly Practices

There have been suggestions that the adoption of family-friendly practices will benefit organizations. More empirical research is needed to see if this is true. A recent article by Konrad and Mangel (2000) summarized a survey of human resource professionals in over 600 organizations. They

found that productivity impact was a function of the type of worker at the organization. That is, the more professionals and the more women in an organization, the stronger the relationship between productivity and family-friendly benefits. If organizations had less skilled employees, who were also lower paid, and had jobs that were more dependent on others, the impact of these programs was negligible. Why might this be? As seen in earlier sections of this chapter, not all family-friendly practices are appropriate for all situations. Some of the options listed in the Konrad and Mangel survey included flextime and part-time work. An individual who is in a job that requires significant dependence on others may not be able to flex his or her schedule. A lower paid person may not be able to afford to work part time. Other options listed in their article included on-site day care. As discussed earlier, working parents without a lot of money may rely on relatives for free day care and would not use this particular benefit. Baughman, DiNardi, and Holtz-Eaken (2003) conducted a survey of 120 employers and found that employers who offered child-care assistance and flexible sick leave had lower rates of turnover than employers who did not.

Best Practices

A starting point for effective implementation of family-friendly programs is to recast them as work-balance programs. As seen in the backlash section of this chapter, by defining the program as family friendly, the organization may unintentionally alienate employees without spouses or children. Some perceptual problems related to equity are resolved by considering the initiative a work-life balance program rather than a family-friendly program.

Next, according to Nord, Fox, Phoenix, and Viano (2002), design issues and interrelationships with other human resource administrative concerns can limit work-life balance programs' success. In addition, they suggested that even if an organization has such programs, employees do not always take advantage of them. Hence, neither the employee nor the organization accrues benefit from the program. Based on their research, which examined several companies with these policies, they made a number of suggestions. First, top-level managers must be committed to the program. This means that these managers must be willing to deal with clients in the organization's environment as well as to send a consistent message about valued behavior. Second, human resource managers must serve as liaisons between top management and employees. In cases of conflict, employees may be more willing to approach the human resource department than their immediate manager. Third, lower level managers may have to modify their managerial styles. This might involve how they manage and evaluate telecommuters or users of flextime. Fourth, the organization must monitor perceptions of the programs for fairness. Fifth, the organization should examine how these programs mesh with the performance evaluation system currently in effect. They should study whether employees

are being evaluated on the actual results of their labor or just on the amount of their face time at work. Finally, organizations should make sure that there are enabling resources available to employees in the programs (such as telecommuting) that facilitate good performance.

CONCLUSION

As the workforce changes, a number of organizations will investigate some of the practices listed in this chapter. Organizations will have to consider and refine goals for effective implementation of these programs. It is possible that many organizations will use a more results-oriented approach to work, especially in areas where employees are self-directed and function at a more autonomous level. To resolve equity concerns, it is likely that family-friendly policies will be renamed work-balance policies. Regardless of the name of the program, the underlying goal will be resolution of role conflict to the benefit of the employee, organization, and society.

REFERENCES AND FURTHER READINGS

- Baughman, R., DiNardi, D., & Holtz-Eakin, D. (2003). Productivity and wage effects of "family-friendly" fringe benefits. International Journal of Manpower, 24, 247–259.
- Beauregard, T. A. (2006). Are organizations shooting themselves in the foot? Equal Opportunities International, 25, 336–353.
- Budd, J. W., & Mumford, K. A. (2006). Family-friendly work practices in Britain: Availability and perceived accessibility. Human Resource Management, 45(1), 23-42.
- Burkett, E. (2000). The baby boon: How family-friendly America cheats the childless. New York: The Free Press.
- Cohen, A. R., & Gadon, H. (1978). Alternative work schedules: Integrating individual and organizational needs. Reading, MA: Addison-Wesley Publications.
- Friedman, S. D., & Greenhaus, J. H. (2000). Work and family-Allies or enemies? What happens when business professional confront life choices. New York: Oxford University Press.
- Gottlieb, B. H., Kelloway, E. K., & Barham, E. (1998). Flexible work arrangements: Managing the work-family boundary. New York: John Wiley & Sons.
- Higgins, C., Duxbury, L., & Johnson, K. L. (2000). Part-time work for women: Does it really help balance work and family? Human Resource Management, 39, 17-32.
- Joice, W., & Verive, J. (2006). Telework and federal employee dependent care. Public Manager, 35(3), 44-49.
- Katz, D., & Kahn, R. L. (1978). The social psychology of organizations (2nd ed.). New York: John Wiley & Sons.
- Konrad, A. M., & Mangel, R. (2000). The impact of work-life programs on firm productivity. Strategic Management Journal, 21, 1225-1237.

- Laycock, A. B. (2003). Strategies for reshaping the workplace. Ann Arbor, MI: Roma Communications.
- LoJacono, S. (2001). Mildly ill/back-up child care: A growing trend in employee benefits. Compensation and Benefits Review, 33(5), 54-58.
- Nord, W. R., Fox, S., Phoenix, A., & Viano, K. (2002). Realworld reactions to work-life balance programs: Lessons for effective implementation. Organizational Dynamics, 30, 223-238.
- O'Toole, R. E., & Ferry, J. L. (2002). The growing importance of elder care benefits for an aging workforce. Compensation & Benefits Management, 18(1), 40-44.
- Parker, L., & Allen, T. D. (2001). Work/family benefits: Variables related to employees' fairness perceptions. Journal of Vocational Behavior, 58, 453-468.
- Rapoport, R., Bailyn, L., Fletcher, J. K., & Pruitt, B. H. (2002). Beyond work-family balance. San Francisco: Jossey-Bass.
- Remery, C., van Doorne-Huiskes, A., & Schippers, J. (2003). Family-friendly policies in the Netherlands. Personnel Review, 32, 456-473.
- Rivera, C. T. (2001). Are new family-values workplaces valuing all workers? Office Solutions, 18(1), 12-18.
- Rothausen, T. J., Gonzalez, J. A., Clarke, N. E., & O'Dell, L. L. (1998). Family-friendly backlash—Fact or fiction? The case of organizations' on-site child care centers. Personnel Psychology, 51, 685-706.
- Sato, H. (2000). The current situation of "family-friendly" Policies in Japan. Japan Labor Bulletin, 39(2). Retrieved August 27, 2007, from http://www.jil.go.jp/bulletin/year/2000/vol39-02.htm
- Siha, S. M., & Monroe, R. W. (2006). Telecommuting's past and future: A literature review and research agenda. Business Process Management Journal, 12, 455-482.
- Schweitzer, L., & Duxbury, L. (2006). Benchmarking the use of telework arrangements in Canada. Journal of Administrative Sciences, 23(2), 105–117.
- Timmermann, S. (2006). Financial gerontology, Boomers, their aging parents, and their employers: What's changed? Journal of Financial Service Professionals, 60(5), 25–27.
- Wharton, A. S. (2006). Understanding diversity of work in the 21st century and its impact on the work-family area of study. In M. Pitt-Catsouphes, E. E. Kossek, & S. Sweet (Eds.), The handbook of work-family: Multi-disciplinary perspectives, methods, and approaches (pp. 17-39). Mahwah, NJ: Lawrence Erlbaum Associates.

CROSS-REFERENCES

Excessive Work and Its Business Consequences (15) Flexible Labor (59)

Career Management (61)

Careers in Transition (62)

PART XI

Organizational Behavior

Motivating Individuals and Groups at Work in the 21st Century

Naomi Ellemers

Leiden University

S. Alexander Haslam

Free University, Amsterdam

DICK DE GILDER

University of Exeter

lassic theories of work motivation tend to focus on individual workers and on the way in which their needs, goals, and rewards affect work behavior. In contemporary work settings, however, more often than not, individuals have to work together with others in (virtual) teams and collaborative work groups. The contemporary world of work is as much (if not more) about "we" as it is about "I." For this reason, management in the 21st century requires an understanding of the motivation and behavior of both individuals *and* groups at work.

This chapter presents a theoretical framework that helps us understand how individual workers relate to each other and to the organizations they work in, and how this impacts their work motivation. Particular attention is paid to individual and group motivation in relation to leadership and group performance. How does leadership inspire us to do more than we otherwise might? And what leads individuals to exert themselves on behalf of a group rather than to loaf? As we will see, answers to these questions hinge on the processes whereby groups become part of our sense of self—our *social identity*—so that "doing it for self" becomes a question of "doing it for us."

MOTIVATION THEORIES

Theories of work motivation aim to understand (a) the conditions that encourage people to invest energy in their work (energize), (b) the activities that they focus their efforts on (direction), and (c) what makes them sustain these efforts over time (persistence). For instance, various models point to ways in which workers can be energized by appealing to particular needs that they are expected to have. Other models provide insight into the direction work-related efforts are likely to take by examining the particular behavioral choices that people make. Finally, theories derived from principles of psychological learning help us understand why certain behaviors are more likely to be sustained than others are.

Although the validity of these motivational processes and their relevance to work-related behavior has been demonstrated in a large body of empirical research, this work is typically used to understand processes underlying the behavior of individual workers as separate agents. As a result, 20th-century insights into work motivation tend to emphasize people's individual needs, their own indepen-

dent goals and expectations, and the personal outcomes they find rewarding. Yet at the same time, developments in the workplace have created a range of situations in which the function of individual needs, goals, expectations, or rewards is less clear. Not least, this is because individual workers have to function in concert and cannot always be seen as representing independent entities. As a result, workers are not necessarily driven by personal considerations alone. Instead, individual motivation is projected upon, informed by, and adapted to the needs, goals, expectations, or rewards of the team or organization in which people work.

In short, the world of work is not just a world of individuals; it is also a world of groups. Accordingly, we need to understand social, group-specific dynamics in order to understand people's motivation within this world. We need to understand what drives "us," not just what drives "me."

MOTIVATION IN THE 21ST CENTURY

Traditional theories of work motivation were developed at a time when workers were mostly concerned with the production of goods, often through physical labor. For example, they spoke to workers on factory production lines, where each individual had their own specified discrete task. In their overview of work motivation theory and research, Gary Latham and Craig Pinder (2005) concluded that there has been relatively little development in work motivation theory during the past decades. As a result, classic models based on individual needs, expectancies, and goals still dominate the literature on work motivation.

However, the working conditions of employees in the 21st century are generally quite different. An increasing proportion of workers are engaged in the exchange of (complex) knowledge or the provision of services, and work is organized in matrix structures, in which workers can fulfill different (and sometimes conflicting) roles. Successful collaboration among individual workers, joint responsibility for customers, and complex processes of communication and information exchange have all become crucial for modern organizations to function effectively. One important consequence of these developments is that it has become more difficult to define individual work performance or to assess individual productivity unambiguously. Where does the individual worker end and the work group begin?

Because this question is not always easy to answer (in functional terms, at least), it is not always clear how classic theories of work motivation—which focus on personal goal setting or individual rewards and reinforcement principles—might apply in these situations. In fact, nowadays, people are increasingly likely to work in (self-managed) teams, such as multidisciplinary project teams. This requires them to support each other in the process of realizing common goals instead of focusing only on the achievement

of individual outcomes. At the same time, due to increased mobility and globalization, some of these teams are only virtual entities. That is, although people have to work together in a team or organization, they may do so from different locations around the world, sometimes without ever having met each other in person. As a result, individual reasons that people may have for collaborating in the achievement common goals, or for helping each other (e.g., because they personally like each other, or because others can monitor their efforts on behalf of the team) are not as relevant in contemporary work situations as they have been in the past. This, we suggest, is why additional theory is needed to understand the work motivation of individuals and groups in the 21st century. In a globalized world, we need a less individualized theory.

Of course, in principle, motivational processes might apply to the achievement of collective goals or outcomes in exactly the same way that they do to individual goals or outcomes. It is easy to see that this is the case when the achievement of individual goals (e.g., earning a sales bonus) is beneficial for the team or organization as a whole (e.g., increasing the sales volume). However, additional concerns come into play when personal goals or expectations (e.g., achieving individual performance targets) are incompatible with collective goals or expectations (e.g., helping new colleagues to "learn the ropes"). Furthermore, lifetime employment nowadays is exceptional and "flexible" working practices are very much in vogue. As a result, there is less reason for individual workers to invest in long-term organizational goals (e.g., working overtime to attract new business) as it is not obvious that they will still be part of the organization by the time these goals are achieved. Workers may therefore be particularly reluctant to exert themselves on behalf of the organization because it is unclear how such efforts might be of personal benefit to them.

The challenge for motivation theory in the 21st century, therefore, is to speak to these contemporary work situations by helping us understand (a) how people are energized to engage in behaviors that are significant primarily at a collective level, such as "service provision"; (b) how they direct their activities toward individual as well as collective goals, in particular, when these seem incompatible; and (c) how they sustain behavioral effort on behalf of the collective in the face of insecure job prospects.

INDIVIDUALS AND GROUPS AT WORK

There is consensus in the scientific literature that developments in motivation theory need to focus on its applicability to teams as well as to individuals. At the same time, relatively little is known about motivation in work groups. The traditional approach to this problem has been to focus on the *interdependence* between individual needs and collective outcomes. For example, managers are advised to create situations in which the achievement of individual goals (e.g., getting a pay raise) ultimately depends on the

attainment of collective goals (e.g., increasing organizational profits). The assumption underlying this reasoning is that individual need fulfillment or goal achievement is the fundamental motivational building block. That is, researchers (and managers) assume that the only way to motivate workers to exert themselves on behalf of the collective is to make them see either (a) that they need other members of their team in order to achieve their personal goals, or (b) that the fulfillment of their personal needs depends on the success of the organization.

It is certainly true that the capacity of a work group or organization to provide rewards or other desired outcomes can constitute a powerful motivating force for individual workers. Material gain is often an attractive carrot. Nevertheless, a broader and richer understanding of the motivational processes that operate in work groups can be gained when we take account of the possibility that *groups in and of themselves* can represent internalized values and important concerns. After all, community responsibilities, a sense of belonging, and shared ideals are all acknowledged as powerful motivating factors in and of themselves.

In this respect, a core limitation of classic theories of work motivation that focus on the *individual* as the primary source of self-conception, is that all expectations, goals, and outcomes that relate to the work group or organization are considered to be *extrinsic to the self*. However, when we acknowledge that there are circumstances under which people come to adopt a primary definition of the self in *collective* terms, this opens up the possibility that group-based expectations, goals, or outcomes can also function as *intrinsic* sources of motivation. Here, self-conception in collective terms can (a) *energize* people to exert themselves on behalf of the group, (b) facilitate the *direction* of efforts toward collective (instead of individual) outcomes, and (c) help workers *sustain* their loyalty to the team or organization through times in which this is not individually rewarding.

What we start to see here, then, is that when the definition of self shifts from being personal ("I") to collective ("we") exactly the same motivational processes that apply to the individual self may come to apply to the collective self. Thus, whereas needs, goals, or expected outcomes are still likely to motivate the behavior of individual workers, when those workers conceive of themselves in collective terms, these are needs of the *group*, *collective* goals, and expected *joint* outcomes. For this reason, an analysis of the circumstances under which the self tends to be defined in collective rather than in individual terms is needed in order to predict *in which situations* the group serves as an intrinsic rather than an extrinsic source of motivation. When does "I" become "we," so that your needs become ours?

THEORY

In the 1970s and 1980s, Henri Tajfel and John Turner developed a theoretical perspective that has had an enor-

mous impact on scientific thinking about group processes and intergroup relations: the *social identity* approach. This comprises two theories: social identity theory (SIT; the most cited source of which is by Tajfel & Turner [1979]) and self-categorization theory (SCT; described by Turner, Hogg, Oakes, Reicher, & Wetherell [1987]). Reprints of the original writings by Tajfel and Turner can be found in a recent volume (edited by Tom Postmes & Nyla Branscombe, in press) The point of departure for the social identity approach is an awareness that while, in some social situations, people think of themselves as independent individuals who interact with each other on the basis of personal characteristics or preferences (e.g., in friendship groups), there are many settings in which people primarily think of themselves and others in terms of particular group memberships (e.g., in terms of their professional roles). The implications of this for understanding the behavior of individuals in organizations were first addressed in 1989, in a widely cited Academy of Management Review article by Robert Ashforth and Fred Mael. Research inspired by Tajfel and Turner's (1979) theoretical statements, and applications of this theoretical perspective to issues in work and organizational behavior, are also discussed in a number of recent books and overview chapters (see "References and Further Reading"). In this entry, we will focus on social identity and self-categorization processes that are most relevant to issues of group motivation.

Self-Categorization

In many situations, people *organize social information* by categorizing individuals into groups. This process of social categorization enables them to focus on collective dimensions of the situation at hand (e.g., managers' interaction with staff) while neglecting the "noise" of other variations (e.g., individual differences in age). The inclination to think of people in terms of their category membership rather than as separate individuals is more pronounced when category memberships tend to remain constant over time, as is the case with gender groups, for example. When individuals can move easily from one group to another (e.g., in the case of work project teams), these categories tend to be less useful as an information organizing principle.

Likewise, when people are addressed and treated in terms of their individual features, they will tend to think of themselves as separate individuals and focus on their personal identities. For instance, if people operate within a career structure where they are only judged on the basis of individual merit, then this will encourage them to focus on defining who they are and what they want in terms of individualistic work motives (e.g., self-development, career progress). In contrast, if others consistently approach and deal with a person as a representative of a particular group, then this person is more likely to adopt a conception of self in group terms, focusing on his or her social identity. For instance, a work environment in which people

are systematically excluded from certain rewards or opportunities on the basis of their category membership (e.g., age, gender, or ethnic background) induces them to think of themselves in terms of that categorization, and to focus on the characteristics, goals, and needs that are associated with that category membership. This process is referred to as *self-categorization*.

In this way, the nature of the categorization (permanent vs. temporary), the way the situation is defined (distinguishing between groups or individuals), and the way people are treated by others (as a separate individuals or as representatives of particular groups) together contribute to the *cognitive accessibility* of particular social categories. This, in turn, will affect the likelihood that a person primarily thinks of him- or herself as a group member rather than as a unique individual.

Social Comparison

Once people start to think about themselves and others as members of the same category, it becomes important to define the meaning of these categories. How people are categorized, and which properties are seen as descriptive of each category or group, is established in part through social comparison with other groups. Depending on which other groups are present in a particular context and how one's own group compares to these other groups, different characteristics may come to be seen as relevant group traits. For instance, salespeople may tend to see themselves as knowledgeable about the technical details of the product they sell when they compare themselves to their customers, but this is less likely to be the case when they compare themselves to the designers and production workers who actually developed the product. Thus, in order to understand the meaning that a group has for its members, one cannot simply seek to identify its objective properties. Instead, it is important to assess which features or behavioral norms help define the group as distinct in comparison to specific other groups in a particular context.

In principle, each individual can be categorized in a number of ways at the same time. As an example, one might be able to categorize a particular work colleague as female, as a member of the sales force, as a temporary employee, as a Christian, or as someone who was trained in a particular way. Which of these different possible group memberships will become salient is also determined through social comparison, as it depends on how useful it is to distinguish people from each other in a particular situation (category "fit"). For instance, when trying to improve the logistics of a production process, differences between production workers and sales representatives are likely to be relevant, because the individuals belonging to these two groups tend to encounter systematically different logistical problems. However, when these same individuals are concerned with the development of an affirmative action program, a categorization in terms of ethnic or gender identity will probably

provide better "fit" with the situation. This is because ethnic or gender categories here will constitute a more appropriate and useful guide for defining one's own position in relation to others than distinctions based on professional roles. Social comparison is crucial because what defines members of the group may differ from one situation to the next, depending on the issue at hand, and the ways in which group members compare to others in that context.

Social Identification

A final issue to consider is the process by which information about social groups is related to the self. The extent to which people identify with a group indicates the extent to which that group contributes to their sense of "who they are," so that they both perceive themselves to represent the group and the group to represent them. Strength of identification determines the degree to which individuals consider characteristic group features to be self-defining, and predicts the likelihood that they adopt distinctive group norms as guides for their own behavior. While most of us simultaneously belong to multiple different groups, the relative degree to which each of these different identities is seen as self-defining in a particular situation or at a given point in time will determine the extent to which they affect motivated behavior in that context. As a result, the same person may propose to keep longer work hours to be able to meet team goals when in a team strategy meeting, but argue against reliance on overtime work when negotiating with top management as a union representative.

In general, people prefer to identify with groups that might contribute to a positive sense of self. Thus, other things being equal, people tend to identify more with groups that have power, status, and success than they identify with those that do not. However, additional concerns may moderate or even override such identity preferences. For instance, people may seek to belong to the avant-garde, or they may develop countercultures to distinguish themselves from the masses, even though this is likely to earn them contempt or ridicule from those belonging to the mainstream. As a result of the search for distinctive group features, people generally tend to identify more strongly with minority than they do with majority groups. Furthermore, people prove willing to identify with groups that compare unfavorably to other groups (e.g., low-status groups) to the extent that they believe the group has the potential to improve its plight, or if they perceive their group's disadvantage to be unjust.

As a result, it is not always easy to predict whether a particular group affiliation will actually be seen as a valued source of identity, or to anticipate which of different potential group norms will be adopted as a behavioral guideline. The process of social identification implies that formal membership in a group is not decisive in itself. Instead, people can refuse to define themselves in terms of a particular category, even if they clearly meet the criteria for inclusion, or alternatively see themselves as representatives

of a group they do not even belong to. This is why we need to establish that people *identify* with a group, before we can expect them to act on behalf of it. This also helps us understand that the mere fact that individual workers can be seen as interdependent with the organization they work in is not sufficient for them to subjectively value this group membership or to adopt the organization's goals as their own.

Identification in Organizations

The cognitive tool of social categorization and the evaluative implications of social comparison processes can both promote a person's emotional involvement in a particular social group: their sense of social identification. In this way, the social identity approach specifies the conditions under which individuals are likely to think of themselves as group members, and to work toward group goals. Furthermore, it helps us understand why particular group memberships tend to become more powerful determinants of behavior than others do.

Some of the mechanisms specified by the social identity approach converge with classic theories of work motivation. For instance, the desire of people to identify with groups that offer access to status, power, or other desirable outcomes corresponds to individual instrumentality and interdependence principles that are traditionally used to explain the psychological connection between individuals and the teams or organizations in which they work. Importantly, however, insights of the social identity approach extend these traditional views by also informing us about the circumstances under which people tend to identify with collectives *in the absence* of interdependence or individual instrumentality considerations.

By way of illustration, the notion that people tend to focus on categories that furnish them with a *distinct* identity implies that people are less likely to identify as groups become larger and more inclusive. This is supported by the empirical observation that people tend to resist organizational changes (e.g., mergers, or moves toward privatization in the public sector) to the extent that these seem to undermine the distinctiveness of their professional identities. Indeed, it has been shown that acceptance of such change is enhanced when workers can in some way maintain their distinct identity within the new structure.

Additionally, the social identity approach not only focuses on features that define a particular group in the present, but also emphasizes the importance of *future prospects for improvement*. So even if a team or organization is unsuccessful at present, people's identification can still be maintained through a conviction that its outcomes or achievements might improve. Thus, current (lack of) success of the team or organization is not the sole determinant of people's willingness to identify with it. In addition, the perceived stability and legitimacy of current outcomes determines the perceived value of the group, and hence, the degree of group identification.

IDENTIFICATION AND WORK MOTIVATION

Now that some of the basic psychological mechanisms that characterize the social identity approach have been introduced, the remainder of this chapter will examine how these theoretical insights can contribute to the understanding of work motivation. Here, specific attention is given to issues of work commitment, leadership, and group performance in order to illustrate the way in which social identity and self-categorization processes relate to the motivation of individuals and groups at work.

Commitment

The literature on organizational behavior has recognized organizational commitment as an important construct in work motivation, arguing that feelings of commitment can motivate individual workers to behave in accordance with organizational goals. Accordingly, a large body of research (summarized in a meta-analysis carried out by Meyer, Stanley, Herscovitch, & Topolnytsky, 2002) has established that high levels of commitment are associated with low levels of individual "withdrawal" behavior, as is indicated by statistics on absenteeism, tardiness, and organizational turnover. Commitment also predicts a general willingness to engage in discretionary work-related effort such as helping one's colleagues at work, or "going the extra mile" (otherwise referred to as "organizational citizenship behavior").

In the literature on organizational commitment, a distinction is made between commitment based on perceived interdependence between the individual and the organization—"continuance commitment"—and a form of commitment that refers to the affective ties between the individual and the organization: "affective commitment." These different forms of commitment, together with their antecedents and consequences, are discussed at length by Nathalie Allen and John Meyer (1997) in their book Commitment in the Workplace. Research in this tradition consistently shows that individuals' affective involvement with the group emerges as the strongest predictor of their group-oriented efforts. These efforts are displayed, among other things, in attendance, performance, and organizational citizenship behavior. Perceived interdependence (continuance commitment) may effectively tie individuals to the organization, so that those who feel they have much to lose by leaving the organization are less likely to do so. However, this interdependence-based form of commitment fails to induce optimal work behavior.

Work on organizational commitment thus converges with research carried out within the social identity tradition in so far as both establish the limited value of individually instrumental considerations (reflecting perceived interdependence between individual outcomes and collective outcomes) as a way of inducing group-focused efforts. Both perspectives indicate that it is the affective sense of *emotional involvement* of the self with the group (referred to either as "group

identification" or "affective commitment") that motivates individuals to direct their efforts toward group goals.

Yet while this consistency is encouraging, it also raises the question of how these two theoretical perspectives and research traditions relate to each other. For this reason, it is important to consider whether thinking about organizational commitment as a form of social identification adds any value to our understanding of work commitment. A first reason why we contend that it does is that this conceptualization helps us understand the *conditions* that foster a concern with collective, rather than individual, conceptions of self. Indeed, the social identity perspective deepens our understanding of the *psychological processes* that either elevate or depress feelings of commitment, and helps predict *which* of various possible sources of collective self-definition will have primacy in any given situation.

In this regard, previous research into organizational commitment has indicated that a sense of involvement can be derived from different organizational constituencies (e.g., customers, top management) and can have multiple foci (e.g., one's work team, one's profession, one's department). But when will one focus of commitment be more relevant than another? And what are likely to be the motivational consequences of commitment? The social identity approach provides a basis for answering such questions, as it posits that people are likely to consider themselves and others in terms of group memberships that help them distinguish in meaningful ways between social stimuli (i.e., people and things associated with them) that are salient in the situation at hand. For instance, in work situations that involve interactions with representatives of other organizations or with external customers, employees should be more inclined to perceive their own organization as a single entity, as this representation provides the most fitting perceptual and behavioral guide in relation to the task at hand. However, when these same individuals interact with coworkers within the organization (e.g., in a strategy meeting), a conception of the self and others as organizational members is less informative, as this is the identity they all share. Here, then, employees are more likely to focus on a categorization that distinguishes between different coworkers—so that, for example, their work team or department becomes the relevant focus of self-definition and commitment.

Being able to understand and anticipate such shifts in people's use of social categories in turn provides a basis for predicting the behavioral consequences of resulting feelings of commitment. This is not trivial because it is not always clear how different foci of commitment relate to each other, nor is it self-evident that the goals of each organizational constituency reflect a common or converging purpose. In principle, commitment to the organization or to the work team should motivate people to pursue collective goals instead of focusing on their individual outcomes. However, it is important to note that team goals are not necessarily aligned with broader organizational goals. For instance, it has been established that when workers primarily identify

as team members, they are less likely to share information with other work teams, even though the exchange of this information would contribute to the success of the organization as a whole.

In this way, the application of a social identity approach enables us to consider identification as a dynamic outcome of situational features, rather than as a property that emerges consistently in particular individuals or cultures (e.g., those that are collectivist rather than individualist). On one hand, this implies that the tendency to identify with a collective should be seen not as a generic inclination but as a group-specific one. This means that where people can be seen as belonging to multiple groups, in any one situation they will tend to define themselves in terms of particular categories (e.g., their work team) rather than others (e.g., the organization as a whole). On the other hand, it means that when focusing on a particular group, an individual's willingness or reluctance to identify with that group should not be regarded as a stable predisposition but as context dependent. So while a female doctor may try to avoid being seen as a member of her gender group when at work, in the community where she lives, she may be perfectly happy to act as a representative of women in a discussion of recreational facilities.

Thus, the added value of the social identity approach is that it helps us understand issues of collective motivation in complex situations where multiple (and possibly conflicting) group memberships operate simultaneously. It does this by providing conceptual tools that specify the psychological processes that operate in such situations and delineating the factors that determine the relative salience of one identity over other alternative identities in any given situation. Such an analysis in terms of social identities has provided important new insights, for example, in the study of organizational mergers. This research has revealed that retaining some of the original structures or characteristics of the constituent organizations can help employees transfer their sense of common identity to the merged organization. This is the case because employees' sense of commitment to the newly merged organization depends on their identification with the premerger organization as well as their ability to recognize that premerger organization in the new one. Similar conclusions emerge from studies of organizational acquisitions and restructures. In all such research, a central theme is that the patterning of (changing) social identifications proves to be the key underpinning to people's (changing) motivational orientation. Only where there is identification there is effort.

Leadership

In 2007, American Psychologist devoted a special issue to the topic of leadership because of a conviction that international political developments, as well as the successes and failures of public and private organizations, depend on the quality of the leadership that guides them. At the same

time, there is general consensus that in recent years, psychological research and theory has made limited progress in helping us understand what makes for good leadership, and it is argued that new developments in psychological theories on leadership should benefit from a focus on the perspective of followers. Thus, the relationship between leaders, followers, and the common goals they want to achieve is seen as central to understanding what makes for good leadership. Importantly, a group-based approach to motivation of the form provided by the social identity perspective helps us to understand the dynamic interplay between these elements, and thereby to clarify some key features of the leadership process.

Traditionally, approaches to leadership focus on the individual character of the leader. Whether someone is likely to emerge as a leader, or is effective as a leader, is seen to result from their specific behavioral styles or talents ("charisma"), or attributed to the special interpersonal relationships they develop with their followers ("leader member exchange" [LMX]). Taking a rather different position on these issues, advocates of the social identity perspective define effective leadership as the ability of a leader to be seen to embody a social identity that he or she shares with followers, and hence, to exert influence over those followers in a way that allows them to contribute to the achievement of collective goals.

Here, the operation of self-categorization and social identity processes suggests that the acceptance of any leader depends on situational features, as these determine the likelihood that followers either focus on the identity they share with the leader, or consider ways in which the leader is distinct from them. This approach helps understand *who* is most likely to be accepted as a motivating force by others, and under which conditions they will be most *successful* in motivating their followers. The central argument here is that it is the potential of leaders or managers to create, sustain, and communicate a sense of *shared identity* that determines the success of their attempts to energize, direct, and sustain particular work-related behaviors in their followers.

For a range of practical reasons, leaders cannot always behave in ways that are individually rewarding for their followers, not least because their role requires that they supervise and, on occasion, criticize and correct the work carried out by those for whom they are responsible. However, when these leaders are viewed as sharing a common identity with their followers (i.e., as in-group members), this has a range of positive perceptual and behavioral consequences. Here, negative leadership behaviors tend to be "explained away" as products of external pressures, and they are seen as less informative of the true nature and intentions of the leader than they are when the leader is perceived as having a different identity (i.e., is seen as an out-group member). As a result, research has established that leaders who are perceived as sharing a common identity with followers are more effective in motivating them to remain loyal and cooperative, even after displays of leadership behavior that

challenges workers' personal identities (say, in the way that criticism does). However, if leaders are seen as out-group members, similar leadership behavior tends to result in negative leader evaluations, loss of motivation, and lack of cooperative behavior.

These findings imply that the extent to which followers perceive their leaders as sharing (or not sharing) the same identity has important consequences for the motivating mechanisms that can be used effectively by the leader. More specifically, loyalty to an in-group leader emerges relatively unconditionally (in part as a product of identity-based *trust*), but motivation to cooperate with a leader who is seen to be an out-group member proves to be dependent on his or her capacity to provide rewards for the subordinate.

The social identity perspective can also help answer the question of *whose* guidelines are most likely to be accepted by others as a motivational force in cases of naturally emerging leadership. A crucial concern here is the extent to which a (prospective) leader is seen to represent the group's distinct identity—that is, the extent to which the leader is perceived as embodying those traits, behaviors, or attitudes that are characteristic or *prototypical* for the group. Importantly, the social identity approach maintains that this prototypicality is *context-dependent*. This means that different properties may come to be seen as characteristic for the group depending both on the other groups present in the situation and on the ways in which the in-group is seen to be distinct from those particular out-groups.

The novel contribution of this way of thinking is that it enables us to predict how-in an intergroup contextpeople's willingness to follow particular leaders rather than others depends on characteristics or features that help distinguish the in-group from other groups. Indeed, in some cases, it would be quite difficult, if not impossible, to understand the relevance of these characteristics for leadership acceptance on the basis of a more traditional individualistic analysis. Some examples help illustrate this reasoning. A program of research by Alex Haslam, John Turner, Michael Platow and their colleagues (which is reviewed in Haslam, Van Knippenberg, Platow, & Ellemers, 2003), demonstrated how the selection of a group leader depended on the perceived characteristics of those against which the group had to compete. When the rival group was thought to have a leader who excelled in terms of intelligence, the interesting consequence was that the majority of group members voted for an in-group leader who was unintelligent (but considerate). This was because, in this particular intergroup context, these were the characteristics that helped distinguish the ingroup from the out-group in a meaningful way. In a similar vein, a leader who favored in-group members who opposed the out-group generally received more support and was better able to mobilize individual efforts than a leader who treated all in-group members equally (i.e., one who was more fair). Again, this is consistent with the notion that it is not the desirability of the leader's behavior (intelligence or fairness), per se, that determines acceptance by his or her followers, but the extent to which the behavior of the leader helps followers appreciate the distinct meaning of their

shared identity compared to other groups in that situation. In sum, theory and research indicate that leaders are able to engender greater loyalty and cooperativeness to the extent that followers perceive them as in-group members, while a failure to establish a sense of shared social identity will mean that leadership effectiveness depends on the leader having the instrumental means to facilitate and reward the achievement of individual goals. For this reason, there is much to be gained by a leader who is able to create and marshal a sense of social identity that they share with their followers. Indeed, work by Steve Reicher and Nicholas Hopkins (2003) has shown that it is possible to conceptualize leaders as "entrepreneurs of identity" who engender followership by creating a shared sense of "us." In this sense, then, "charisma" or "transformational leadership" is perhaps best seen as the ability or talent to instill such an experience of common identity among one's followers, rather than as a specific personality profile that leaders may or may not have.

History and politics provide many examples of this process in action. One way in which this is often achieved is by drawing attention to—and encouraging conflict with—a "common enemy" (e.g., a competing organization). Where this strategy is successful, the sense of shared identity it creates proves capable of motivating workers to make personal sacrifices (e.g., working overtime, accepting lower raises) that benefit the organization as a whole, turning otherwise reluctant conscripts into willing soldiers. However, when these same organizational members are induced (e.g., by reward structures) to categorize themselves and others at a different level of inclusiveness (e.g., as members of competing work teams), similar attempts to induce organizational citizenship behavior may be much less effective (or even counterproductive), as people here are more likely to turn to the leader who embodies team goals that are not necessarily compatible with those of the broader organization.

In a similar vein, anything that sets the leader apart from the group can serve to lower a sense of common identity and hence undermine leadership effectiveness. This has some less-than-obvious consequences that are hard to explain on the basis of traditional models of leadership effectiveness. For instance, pointing out that a leader possesses exceptional skills may seem beneficial, as it might help legitimize his or her position. However, the downside of such a focus on distinctive individual qualities is that it may also set the leader apart from the rest of the group. Accordingly, experimental research has demonstrated that, in certain circumstances, a leader who was randomly selected from the group was more successful in motivating group members to work together on a joint task than a leader who stood out from the group in terms of his or her individual competence.

A similar mechanism can come into play when reward structures clearly differentiate between leaders and team members. In organizations, it is common practice for leaders to receive greater rewards, as they are expected to have greater responsibilities, meet stricter standards, or work harder than their subordinates work. However, when such differences in rewards become too large, or when an appeal to workers to curb their requests for salary raises occurs at the same time that management receives huge bonuses, the adverse consequence may be that it undermines any sense that leaders and followers share a common identity. This possibility was confirmed in research indicating that while a differentiated reward structure served to motivate leaders, group members working under such a regime actually reported less enthusiasm and displayed less effort on a collective task than they did under conditions where leaders and followers received equal rewards. The key role of identification in leadership effectiveness is also supported by recent research showing that when followers can identify with the leader, the followers show cooperative behavior even when they have a poor interpersonal relationship with that leader. Additionally, identification with the leader has been shown to compensate for motivation losses arising from suboptimal job design or previous group failure.

In summary, the application of insights from the social identity approach to the emergence and effectiveness of leaders indicates that the secret of successful leadership lies in the capacity of the leader to induce *followers* to perceive him or her as the embodiment of a positive social identity that they have in common, and that distinguishes them from others. Metaphorically speaking, successful leaders are those who create a sense that they and their followers are "in the same boat." To the extent that they make this boat (appear) superior to others, not only are those who are in it more likely to row hard and in concert, they are also much more likely to show the stomach for choppy water.

Group Performance

As we noted at the start of this chapter, over the past decades, the proportion of people who work in groups or (self-managing) teams has steadily increased. The benefits of this relate to popular beliefs about the "synergy" that can emerge when working in groups, but also appear to be confirmed by scientific evidence gleaned from organizational settings. Among other things, this work suggests that work teams offer opportunities for job enrichment, give workers a sense of autonomy, decrease the workload of supervisors, and enhance performance on tasks that are too complicated for individuals alone. However, because teams are used for a wide variety of reasons and because they have to work in a wide range of contexts, it is difficult to draw general conclusions about the effects of teamwork. Thus, a pertinent question is whether we can predict the conditions under which teams are likely to perform successfully and understand why this is the case.

Indeed, alongside demonstrated advantages of teamwork, research also points to its potential drawbacks. In

particular, the well-known phenomenon of "social loafing" means that people often expend less effort when they perform a task collectively than when working on the same task individually. This invites a rather negative view of teamwork, suggesting that people are generally less willing to exert themselves in group settings than when working alone. However, research has revealed that such motivation loss is less likely to occur in groups of close friends or teammates than it is in groups comprised of strangers or mere acquaintances, due to the higher levels of commitment that are observed in the friendship groups. This again suggests that social identification has an important role to play when explaining why the performance of the group can be either enhanced or impaired relative to the performance of its individual members. More specifically, it appears that when workers identify with a particular group, they are likely to be energized to act in the interests of that group (thereby working to achieve superior group performance) rather than purely in their personal interests (which might involve conserving energy or doing something more in line with their personal goals).

The role of identification in-group performance is all the more important in view of 21st-century work conditions. Work globalization and technological progress imply that the collaboration in work teams is often virtual, with team interactions mainly occurring via the exchange of written information through computer networks. According to traditional approaches to group performance, one would predict that this should result in a loss of commitment and suboptimal performance, due to the comparative anonymity of team members and the greater difficulty of developing interpersonal interactions or friendships under these circumstances. However, a social identity perspective is less pessimistic. This maintains that identification as a group member does not depend simply on the formation of interpersonal ties between group members, but will also be facilitated by situational factors that enhance the salience of the relevant social categorization. Indeed, consistent with this analysis, research has shown that in virtual teams, the fact that communication takes place via computer interactions discourages team members from attending to individual differences, and helps them focus on the group membership of the people they communicate with. Paradoxically, then (at least from the standpoint of traditional theorizing), anonymity and personal distance can enhance commitment rather than reduce it.

In this way, we can see that perceptions of a common identity and resulting feelings of identification with the work group constitute an important factor that motivates group members to work toward collective goals. However, whether the resulting behavior actually enhances or diminishes the group's performance depends on the relevant comparative context and its implications for the group's distinct identity. Thus, it is important to note that adopting behavioral norms that characterize the group as distinct from other groups will not necessarily result in greater group productivity. Indeed, systematic underperformance

can eventuate if workers direct their behavior toward specific group norms that are perceived to be undesirable from a managerial point of view. A counterintuitive consequence of this process is that enhanced group identification can even increase the amount of effort directed at the achievement of *individual* goals when distinctive group norms prescribe individualistic behavior (e.g., as happens if an organization's culture emphasizes individual competitiveness). Indeed, a review of recent research (Ellemers & Rink, 2005) shows that the emergence of collective identification only directs workers' efforts toward the enhancement of their joint performance when this helps achieve or maintain a distinct collective identity.

When aiming to establish the circumstances under which group members will sustain their efforts on behalf of the group, it is also important to consider whether group members consider a change in their collective performance that can imply either improvement or deterioration—to be a realistic prospect. In line with the social identity approach, research has shown that this depends on how the current performance of the group compares to that of other groups. Knowledge that the group consistently outperforms relevant other groups can elicit satisfaction with the group's achievements resulting in a sense of complacency and lack of effort. In contrast, when the group is currently performing worse than relevant comparison groups are performing, awareness that other groups have achieved higher performance levels can make a performance improvement of the group seem feasible, and this can help group members actually achieve a superior group performance themselves. In a similar vein, awareness that the group is *losing* its competitive edge (e.g., because other groups are improving their relative performance) can help sustain a high level of collective effort. In other words, individuals will sustain their efforts on behalf of a group when they consider collective performance improvement to be a realistic prospect, or when they are concerned with the possibility of losing an advantageous collective position.

In sum, applications of social identity theorizing enable us to explain how group performance can be optimized even when individual contributions cannot be monitored, or when contributions to collective performance clearly are not individually rewarding. At the same time, we have also established that providing groups with a sense of collective identity is only a first step toward the achievement of optimal group performance. In addition to energizing individuals to work for collective goals, group norms also need to direct members' efforts toward the achievement of superior group performance. Moreover, these efforts will only be sustained when collective performance improvement seems feasible.

FUTURE DIRECTIONS

The social identity approach points to the fact that the same individuals may perceive themselves (and behave) quite

differently from one situation to the next. Sometimes they act as separate individuals but at other times, they behave as team members, or they perceive themselves to be interchangeable with other members of their organization. As a result, there is no one best way to motivate people at work, and there are no generic, off-the-peg solutions for problems of group motivation. Because "who we are" changes, so too do our motivations, and so too must the strategies designed to harness, direct, and maintain those motivations.

When the aim is to examine why a broad range of people are leaving an organization, or what is motivating them to stay, the organization represents an appropriate level of inclusiveness at which identification (or lack of it) should be assessed. However, when the intention is to promote people's efforts toward a particular team performance, one should focus on the extent to which they identify with that team, and examine how displaying the desired performance might enhance the team's distinct identity. At the same time, the common practice of treating workers as separate individuals in the hope that their efforts to fulfill their individual ambitions will be of benefit to the organization as a whole, seems less worthwhile from this point of view.

Nevertheless, once it has been established which motivational problem needs to be addressed and how this relates to the way in which workers in the organization think of themselves and others, measures can be taken to enhance the appropriate identity. Future work should further specify how this might be done, and should evaluate the identity and performance effects of different interventions. To be effective, such measures should not be restricted to formal features of the work situation, such as the nature of the reward structure. Instead, they should also encompass more informal aspects of the organizational culture as well as its enactment by management. Indeed, the effectiveness of any measure intended to motivate people to engage with collective goals is likely to be undermined when the broader organizational structure and culture continue to foster a consideration of the self as a separate individual. This is the case, for instance, when team collaboration and mutual helping are said to be encouraged, while rewards and bonuses continue to be awarded on the basis of individual output instead of team performance.

On one hand, from a managerial point of view, this implies that there is scope to encourage the operation of collective motives by adapting salient features of the work situation, such as the reward system (e.g., by introducing team bonuses) or career opportunities (e.g., by promoting those who show superior collaborative skills). On the other hand, however, to the extent that organizational practices resist such change (e.g., because they are legally anchored), management should be aware that this is likely to limit the effectiveness of their attempts to influence the focus of their workers' motivation and effort. Both types of effects should be taken into account when considering the potential effectiveness of concrete interventions.

The aim of this chapter was to show that social identity processes can have consequences that seem difficult to predict or understand from a more individualistic perspective on work motivation. This should not be taken to imply that individual needs, goals, outcome comparisons, or reinforcement mechanisms are unimportant. However, one should note that these same principles of motivation may have fundamentally different implications when applied at a collective level. In doing this, the tendency to define the self primarily in individual or collective terms (or more in terms of one particular group membership than another) should be seen as an adaptive response to the situation at hand. This deviates from more traditional approaches that conceive of the willingness to invest in collective goals or work to increase joint outcomes as a stable personality characteristic, or as depending on cultural norms. At the same time, it offers scope to develop practices that may actively encourage and to foster the sense of common identity that is likely to direct individual efforts toward the achievement of collective goals. In doing this, it is important to establish how different organizational features are likely to affect social identification processes. Marshalling individual employees to work toward team or organizational goals, requires that evaluation and reward structures reinforce a self-definition in collective—rather than individual—terms, that relevant work goals apply to groups instead of individuals, and that equity is achieved at a group level as well as an individual level.

SUMMARY

This chapter proposes that our understanding of individual and group motivation in the workplace can be enriched through awareness that the self can be defined in different ways and at different levels of abstraction. Classic approaches to work motivation focus on individual considerations as the main determinant of motivated behavior, assuming that people work toward the achievement of individual goals and rewards, or try to avoid individual sanctions. However, because work in the 21st century is characterized by collective service provision, teamwork, and a flexible workforce, it is important to see motivation as more than personal. In particular, we need to consider when people may be motivated to behave in ways that express or support an identity that is shared with others in the work situation. We need to see motivation as grounded in people's sense of themselves as "us" not just "me."

The primary strength of the social identity approach is that it addresses this issue by considering—and demonstrating the power of-shared identities as relevant sources of motivation. It posits that no single identity is inherently more important or more valid than another, but specifies the conditions under which a particular identity is likely to exert an influence on a give person's motivational system. Evidence indicates that when the situation fosters a definition of the self in individual terms, individually instrumental considerations are crucial determinants of work motivation. If, however, the situation induces workers to identify as parts of a collective, they are more likely to be concerned with the enhancement of that collective identity—pursuing shared goals or behaving in ways that are normative for that identity.

In the 21st century, it strikes us that there are two massive challenges ahead for work motivation theory and practice. The first is to establish how we may harness the power of the collective by encouraging identifications that meaningfully relate to shared motivation. The second is to create social identities whose *content* motivates us to work toward goals that help rather than hinder collective wellbeing and joint outcomes. For ultimately, it is the social identities we create that will determine the world in which we work and live.

AUTHORS' NOTE

This entry is based on Ellemers, N., De Gilder, D., & Haslam, S. A., 2004. Motivating individuals and groups at work: A social identity perspective on leadership and group performance. *Academy of Management Review*, 29, 459–478. Copyright 2004 Academy of Management (NY). Reproduced with permission of Academy of Management (NY) via Copyright Clearance Center.

REFERENCES AND FURTHER READINGS

- Ashforth, B. E., & Mael, F. (1989). Social identity theory and the organization. *Academy of Management Review*, 14, 20–39.
- Ellemers, N., De Gilder, D., & Haslam, S. A. (2004). Motivating individuals and groups at work: A social identity perspective on leadership and group performance. Academy of Management Review, 29, 459–478.
- Ellemers, N., & Rink, F. (2005). Identity in work groups: The beneficial and detrimental consequences of multiple identities and group norms for collaboration and group performance. *Advances in Group Processes*, 22, 1–41.
- Ellemers, N. Spears, R., & Doosje, B. (Eds.). (1999). *Social identity: Context, commitment, content*. Oxford, UK: Blackwell.

- Haslam, S. A. (2004). *Psychology in organizations: The social identity approach* (2nd ed). London: Sage.
- Haslam S. A., & Ellemers, N. (2005). Social identity in industrial and organisational psychology. *International Review of In*dustrial and Organizational Psychology, 20, 39–118.
- Haslam, S. A., Van Knippenberg, D., Platow, M., & Ellemers, N. (Eds.). (2003). Social identity at work: Developing theory for organizational practice. New York: Psychology Press.
- Hogg, M. A., & Terry, D. J. (Eds.). (2001). Social identity processes in organizational contexts. New York: Taylor & Francis.
- Latham, G. P., & Pinder, C. C. (2005). Work motivation theory and research at the dawn of the twenty-first century. *Annual Review of Psychology*, 56, 485–516.
- Meyer, J. P., & Allen, N. J. (1997). Commitment in the workplace: Theory, research, and application. London: Sage.
- Meyer, J. P., Stanley, D. J., Herscovitch, L., & Topolnytsky, L. (2002). Affective, continuance, and normative commitment to the organization: A meta-analysis of antecedents, correlates, and consequences. *Journal of Vocational Behavior*, 61, 20–52.
- Postmes, T., & Branscombe, N. R. (Eds.). (in press). *Rediscovering social identity: Core sources*. London: Sage.
- Reicher, S. D., & Hopkins, N. (2003). On the science of the art of leadership. In D. van Knippenberg & M. A. Hogg (Eds.) Leadership and power: Identity processes in groups and organizations (pp. 197–209). London: Sage.
- Tajfel, H., & Turner, J. C. (1979). An integrative theory of intergroup conflict. In W. G. Austin & S. Worchel (Eds.), *The social psychology of intergroup relations* (pp. 7–24). Monterey, CA: Brooks/Cole.
- Turner, J. C., Hogg, M. A., Oakes, P. J., Reicher, S. D., & Wetherell, M. S. (1987). Rediscovering the social group: A self-categorization theory. Oxford, UK: Blackwell.

CROSS-REFERENCES

The Evolving Nature of Work Teams: Changing to Meet the Requirements of the Future (50)

Coordination in Global Teams (52)

Diversity and Diversity Management in the Age of Globalization (64) Intrinsic Motivation in Public Organizations (69)

Why Self-Set Goals May Sometimes Be Non-Motivating (70)

Intrinsic Motivation IN Public Organizations

LEONARD BRIGHT

University of Louisville

ince the rise and domination of large complex organizations in our society, scholars and practitioners have focused on understanding the conditions that motivate employees to effectively serve the goals of these organizations. Early on, many scholars believed that employees could be primarily motivated to serve the goals of organizations with the effective use of monetary incentives. Perhaps one of the early most influential scholars to promote the value of monetary rewards was Fredrick Taylor (1916). His strategy involved decomposing whole jobs into their most simplistic standardized elements and paying employees piecemeal according to the work performed. Inadvertently this practice created a class of work that was rudimentary, dehumanizing, and devoid of those aspects that provide individuals with a sense of pride, accomplishment, and participation in a larger group enterprise. While Taylor had hoped that the lack of intrinsic qualities in the employees' work would be offset by higher rates of pay due to greater productivity, this goal was not fully accomplished in most organizations.

Fortunately, there are scholars and practitioners who challenge the assumption that the intrinsic qualities of work should be sacrificed or replaced by monetary rewards to motivate employees. These voices came out of the human relations movement. This movement encouraged organizations to emphasize the nonmonetary motivators that positively influence the well-being, satisfaction, commitment, and job performance of employees. This advice has been embraced whole-heartedly by many scholars and practitioners, particularly in the field of public administration, which

has shown that public employees are distinctively attracted to the intrinsic nonmonetary qualities of their work environment, mainly when compared to private-sector employees. This is very important and pragmatic given the fact that public organizations often lack the financial resources to rely heavily on monetary incentives as a major motivational strategy. However, some public administration scholars often characterize intrinsic motivation in ways that are inherently incompatible with our 21st-century organizational environment and prevailing human relations principles. Consequently, the purpose of this chapter is to present a conceptual framework that can be used to explore and understand intrinsic motivation in public organizations.

INTRINSIC MOTIVATION

What is intrinsic motivation? Intrinsic motivation is a subcategory of employee motivation. Kanfer (1990) defines employee motivation as the energy within employees that directs and sustains their efforts in organizations. Stated another way, employee motivation is the fuel that propels individuals to act in certain ways and toward certain goals. This energy is generated from an expectation that internal needs will be satisfied. These internal needs can be physiologically based (such as the needs for food, shelter, and sleep) or psychologically based (such as the needs for love, belongingness, and self-esteem). Maslow (1943) categorizes the psychological and physiological needs as higher level and lower level needs, respectively.

While the psychological and physiological needs are very important to individuals, there are real differences between these needs. According to White (1959) one of the major differences between psychological and physiological needs is their importance to individuals after they are fulfilled. Many believe that the importance of physiological needs decreases as they are satisfied, while the importance of the psychological needs grows as they are satisfied. For example, in normal individuals the importance of the physiological need for food decreases as they receive adequate nourishment, while the importance of the psychological need for love increases in loving relationships.

Additionally, a second difference between psychological and physiological needs is their ability to produce intrinsic motivation. It is the belief of the author that intrinsic motivation is produced from the satisfaction of the higher level psychological needs of individuals, rather than their lower level physiological needs. In other words, intrinsic motivation is produced from the desire or expectation that one's higher level needs will be satisfied. Accordingly, many psychological needs can intrinsically energize employees to accomplish the goals of organizations. The discussion that follows will review four examples of these needs and their importance to individuals.

SELF-DETERMINATION

One psychological need that can produce intrinsic motivation is the need for self-determination. According to DeCharms (1968), individuals have a natural desire to be their own causal agents. In other words, individuals have a desire to do things for themselves without being pressured from outside sources. Some scholars believe that when individuals are pressured from outside sources to do things, they do not feel that they have control over their own lives. Instead, they believe that they are doing things because someone else wants them to. Additionally, Herzberg (1973) described the need for self-determination in terms of individualization. According to Herzberg, individualization is a desire to differentiate one's self from childhood-dependent relationships, which is an indication of psychological growth and health in mature adults.

INTERPERSONAL INTERACTION

A second psychological need that can produce intrinsic motivation is the need for interpersonal interaction. The need for interpersonal interaction is the desire to forge meaningful connections with other people. It is well known that humans are social beings who desire healthy meaningful relationships. These relationships give individuals a sense of their place in the world, in relationship to others and within their communities. Maslow (1943) described the need for interpersonal interaction as the need for belonging-

ness and love. Similarly, other scholars described the need for interpersonal interaction as the need for relatedness.

STIMULATION

A third psychological need that can produce intrinsic motivation is the need for stimulation. The need for stimulation is the desire to have meaningful interactions with the environment. Multiple experimental and developmental studies have established that stimulation is very important for the development of the human brain. The lack of stimulation has been linked to the mental impairment of humans, as well as animals. Goldstein (1995) argued that healthy organisms have a natural desire to have a stimulating environment, while unhealthy organisms consistently avoid stimulating situations, Additionally, Hackman and Oldham (1980) argued that the lack of stimulation in the workplace is a major cause of employees' disinterest, dissatisfaction, and poor job performance. These scholars recommended strategies for assessing the level of stimulation in the workplace, as well as remedies for correcting monotonous working conditions.

GROWTH

A fourth psychological need that can produce intrinsic motivation is the need for growth. The need for growth is the desire to continually improve one's knowledge, skills, and abilities. Maslow (1943) equated the need for growth as a need for self-actualization. Self-actualization is the desire to be the best one can be. He believed that the needs for growth and self-actualization lead individuals on a quest for mastery, achievement, independence, and prestige. Similarly, some scholars illustrate the need for growth as the need for competency as the desire to master the environment and discover its effects on individuals. Additionally, other scholars argue that employees with strong growth needs are satisfied by work that has high levels of autonomy, variety, significance, and feedback.

Moreover, several concluding points are in order. For one, this discussion does not present the entire range of psychological needs that influence intrinsically motivated behavior. Many more psychological needs can influence employees' behavior. Some of these needs are well known, while others are yet to be discovered. This discussion provides only a few examples of the many psychological needs that can influence individuals' behavior. Secondly, individuals will differ on the types of psychological needs that are important to them. Because of differing life experiences, the importance of certain needs to an individual will vary from person to person. Lastly, most scholars implicitly or explicitly agree that intrinsic motivation is produced from individuals' higher level needs. However, as will be reviewed in

the next section, much debate centers on whether intrinsic motivation is produced from a particular psychological need or from a wide range of psychological needs.

INTRINSIC OPPORTUNITIES: THE SOURCES OF INTRINSIC MOTIVATION

It is generally accepted by most scholars that intrinsic motivation is the energy that is derived from the satisfaction of the psychological needs of employees. Unfortunately, there is disagreement in the literature regarding the workplace conditions that can satisfy these needs. Much of this debate also centers on disagreement regarding which psychological need is the primary source of intrinsic motivation. A review of the literature reveals at least two major perspectives concerning the primary sources of intrinsic motivation: source-based and need-based. The discussion that follows will briefly review and critique these viewpoints.

Source-Based Perspective

The first perspective on the conditions that can produce intrinsic motivation is the source-based perspective. The field of public administration largely adopts this perspective. Source-based theorists distinguish between intrinsic and extrinsic rewards based on where the reward originates. They propose that incentives generated from outside the recipients are considered extrinsic opportunities (i.e., recognition and monetary rewards), while incentives generated from within recipients are considered intrinsic opportunities (i.e., feelings of appreciation and well-being). This approach is based on the assumption that individuals strive to be their own causal agents. In other words, people would rather attribute their behavior to themselves, rather than to the influences of others. As a result, the need for self-determination is believed to be the primary source of intrinsic motivation. Prominent source-based scholars note that this need for self-determination is inherently incompatible with extrinsic (externally generated) opportunities. The reason, according to these proponents, is because these opportunities communicate to individuals that they are not in control of their own behaviors.

Need-Based Perspective

The second perspective on the conditions that produce intrinsic motivation is the *need-based perspective*. From the need-based perspective, the most important distinguishing characteristic of intrinsic opportunities is not their source, but the psychological needs of employees that are fulfilled. Workplace opportunities and incentives that fulfill the higher level needs of individuals (i.e., needs for interpersonal interaction, growth, stimulation, and self determination) are considered intrinsically related. On the other hand, opportunities and incentives that fulfill the lower level

needs of individuals (i.e., needs for security and safety) are considered extrinsically related. Unlike the source-based perspective, the need-based perspective is not particular about the psychological needs that can produce intrinsic motivation. As a result, according to the proponents of this perspective, both internally and externally generated opportunities can produce intrinsic motivation if they satisfy the psychological needs of employees.

Critique of Source-Based Perspectives

Both the need-based and source-based perspectives on intrinsic rewards and intrinsic motivation offer important insight; however, this chapter adopts the need-based perspective as the most valid approach to understanding intrinsic motivation for several reasons. For one, a major weakness of the source-based perspective is the assumption that the need for self-determination is the primary psychological need that can produce intrinsic motivation. As previously reviewed, the need for self-determination is one of many higher level needs that produce intrinsically motivated behavior in organizations. Hence, in addition to the need for self-determination, individuals can also be intrinsically motivated from the satisfaction of their needs for growth, stimulation, and interpersonal interactions.

A second weakness of the source-based perspective is its argument that the need for self-determination cannot be fulfilled with the use of externally created opportunities. This perspective implies that intrinsic motivation cannot be addressed by organizations. The human relations movement is based on the premise that organizations should foster workplace conditions that give employees opportunities, such as discretion and autonomy-two job conditions that can positively satisfy employees' needs to be their own causal agent. Hence, most of the conditions in organizations are externally created by the designers, leaders, and managers of organizations. Even further, some scholars argue that people do not interpret externally generated opportunities as controlling events. Instead, these opportunities are understood to be an acknowledgment by the reward giver of his or her lack of control over the reward recipient, since the reward recipient could have chosen not to perform as requested.

Therefore, the conditions that can be intrinsically motivating to employees can be divided into two major categories. Intrinsic incentives generated from within individuals are called *internal intrinsic opportunities*. Examples of internal intrinsic opportunities are feelings of appreciation and well-being. Next, intrinsic incentives generated from sources outside individuals are called *external intrinsic opportunities*. Examples of external intrinsic opportunities are professional development, career advancement, and personal recognition. Both types of opportunities and incentives can potentially be intrinsically rewarding to employees to the extent that they satisfy their higher level needs.

Additionally, two points are in order. First, from this framework, monetary incentives can be intrinsically rewarding to employees. These opportunities can give employees a sense of their progress and accomplishments, which can be satisfying to their growth needs. Secondly, it is also important to note that organizations have more control over external intrinsic opportunities than internal intrinsic opportunities. For example, organizations can directly influence the access that employees have to external intrinsic opportunities, such as task meaningfulness, personal recognition, and career advancement through the design of their work and supervision strategies. Nevertheless, the next section will discuss the benefits that intrinsic opportunities can have on the attitudes and behaviors of employees when they are facilitated in organizations.

THE EFFECTS OF INTRINSIC REWARDS ON EMPLOYEE ATTITUDES AND BEHAVIORS

Intrinsic Rewards and Employee Attitudes

A number of scholars have discovered that fulfilling the higher level needs of employees does benefit employees' attitudes. For example, Lewin (French & Bell, 1999; Weisbord, 1987), a world-renowned experimental psychologist, believed that jobs should not only provide individuals with the ability to acquire wealth, but also with a sense of belonging, respect, self-development, and expression. He believed that once the psychological needs of employees are fully accommodated, organizations would reap the benefits of having highly satisfied employees. Similarly, Herzberg (1973) discovered strong connections between the intrinsic conditions of organizations and the job satisfaction of employees. He argued that the degree of employees' job satisfaction is strongly related to work opportunities that give employees a sense of personal achievement, personal recognition, and career advancement.

Scholars have also argued that the intrinsic conditions of organizations are critical to maintaining the psychological health of employees. For example, Argyris (1957) argued that organizations relying on high levels of task specialization, standardization, and close supervision as motivational strategies are in danger of creating dependent, passive, immature, and subordinate personalities in their adult employees. These conditions are unfulfilling to the employees' psychological needs. Consequently, employees with prolonged unfulfilled psychological needs would become fixated on monetary rewards as a means of counterbalancing their psychological distress. To improve this situation, Argyris recommended that organizations foster intrinsic opportunities that give employees independence from supervisory control, active engagement with other employees, and tasks that fully utilize their abilities in their work.

Similarly, McGregor (1960) believed that intrinsic opportunities were mandatory for the psychological health of employees. He argued that many managers believe that employees are naturally lazy, unmotivated, and hostile to work. This belief justifies authoritarianism, force, and coercive management styles that are psychologically distressing to employees. Instead, McGregor recommended that managers adopt cooperative and participative management styles that rely on intrinsic opportunities to motivate employees to accomplish organizational goals.

Intrinsic Rewards and the Behavior of Employees

In addition, many believe that intrinsic opportunities can positively influence the behavior of individuals in organizations, particularly in terms of their cooperation and performance. For example, Barnard (1968) argued that employees willfully join organizations for the opportunity to cooperate toward common goals. He believed that this willful cooperation cannot be generated with the use of material incentives, such as higher salary. Monetary incentives, in his view, were secondary to the more powerful intrinsic opportunities of distinction, prestige, and peer-group participation. One of the first studies to confirm Barnard's hypothesis regarding the influence that intrinsic opportunities have on employee performance was the Hawthorne study.

The Hawthorne study was conducted in the 1920s by a power company that wanted to understand the relationship that factory lighting conditions had on workers' productivity. In this study, researchers discovered that workers' productivity increased regardless of the lighting conditions in the factory. Unable to fully interpret the result, the researchers assumed that the results were found in error. However, many years later the researchers realized that the workers' productivity was affected by the intrinsic aspects of the experiment, such as the special treatment employees received (i.e., private lunch and attentive managers) during the experiment.

Likert (1967), another researcher, also demonstrated the influence that intrinsic opportunities can have on the job performance of public employees. Building on McGregor (1960), Likert explored the impact that several management styles had on employees' productivity. At one end of the continuum were authoritative management styles. Authoritative management styles are based on the premise that employees are to be distrusted, motivated with threats, and given very little discretion over their own work. At the opposite end of the continuum were participative management styles. Participative management styles are based on the premise that employees are trusted partners, primarily motivated with intrinsic opportunities, and given a high degree of discretion over their own work. Consequently, Likert found that authoritative management styles were associated with greater turnover and conflict. Participative management styles, on the other hand, were associated with greater productivity and cooperation between managers and employees. Similarly, Hackman and Oldham (1975) found strong links among the job performance, the intrinsic quality of work, and the growth needs of employees. These scholars argued that employees with salient growth needs desire jobs with high levels of intrinsic qualities such as task variety and social significance.

COMPARATIVE RESEARCH ON THE INTRINSIC PREFERENCES OF PUBLIC EMPLOYEES

The general literature on intrinsic motivation establishes that intrinsic incentives are not only important to the psychological needs of employees, but also to their attitudes and behaviors in organizations. This section will review the research on intrinsic opportunities from the perspective of public administration. As can be expected, the field of public administration confirms the importance that intrinsic opportunities have to public employees. Consequently, there are three major conclusions that can be drawn from this research. The first conclusion is that public-administration research centers on the importance of monetary opportunities to public and private-sector employees. While monetary opportunities can be intrinsically rewarding if they satisfy individuals' higher level needs, the research has shown that public- and private-sector employees value these opportunities differently. For example, Kilpatrick, Cummings, and Jennings (1964) found that public-sector managers, more often than private-sector manager, ranked gaining more money lower than performing work that is helpful to society. Similarly, Rainey (1982) found that private-sector managers ranked higher pay and making a good deal of money significantly more important than did public-sector managers. Public-sector managers, on the other hand, ranked having opportunities for public service and helping others significantly more important than did private-sector managers. In a more recent study, Houston (2000) investigated the importance that private- and public-sector managers assigned to five work opportunities, such as high income, job security, short working hours, chances for promotion, and meaningful work. In support of existing research, he found that private-sector managers ranked high income as the second most important opportunity, while public employees ranked it as the fourth most important opportunity.

The second conclusion that can be drawn from the public-administration research centers on the importance that public employees assign to intrinsic opportunities. Research has demonstrated that public employees highly desire many kinds of intrinsic opportunities, such as opportunities for career advancement, public service, and meaningful work. For example, Newstrom, Rief, and Monczka (1976) asked a group of public employees to rank several work opportunities according to their desirability. These factors included good working conditions, high compensation, and self-actualization. This study found that public employees highly valued opportunities for self-actualization. Similarly, Rainey (1982) asked a group of public-sector supervisors to rank a number of opportunities, such as work that is helpful to others, recognition from their organization, development of

their abilities, higher pay, and job security. He found that the two most important opportunities to managers were developing their abilities and doing work that is helpful to others. Similarly, Houston (2000) found that when asked to rank opportunities for higher salary, shorter working hours, chances for promotion, and meaningful work, public employees ranked meaningful work as the most important.

A third major conclusion that can be drawn from the public-administration research centers on the relationship that intrinsic nonmonetary opportunities have to the job satisfaction of public employees. Researchers found that the salary of public employees is not related to their satisfaction with their work. For example, DeSantis and Durst (1996) comparatively investigated the impact that pay had on the job satisfaction of public- and private-sector employees. These scholars found that although public employees were less satisfied with their pay, these attitudes did not significantly impact their job satisfaction. On the other hand, the salary level of private-sector employees did significantly impact their job satisfaction. During that same year, Deleon and Taher (1996) examined the job satisfaction of employees working in a local government in Colorado. Confirming previous studies, they found that monetary incentives were not highly related to these employees' job satisfaction. Instead, these scholars discovered that the two most reliable predictors of public employees' job satisfaction were opportunities to form social relationships and professional growth.

POTENTIAL EXPLANATIONS FOR WORK PREFERENCES

Research on the intrinsic preferences of public employees offers important insights. Much of the research suggests that public employees place great emphasis on the intrinsic conditions of their work. These conditions appear to be more important to public employees than monetary opportunities. Hence, even though monetary opportunities can be intrinsically rewarding for many employees, public-administration research findings suggest that the psychological needs of most public employees are best fulfilled with intrinsic nonmonetary opportunities. This finding, however, raises an important question. That is, why are public employees attracted to intrinsic nonmonetary opportunities? The discussion that follows will provide eight potential answers to this question.

Age

The first factor that may affect the work preferences of public employees is age. Statistics indicate that the public-sector workforce is generally older than most private-sector workforces. Age may affect the work preferences of public employees, because it is related to the major defining events that individuals experience in their lives. Major defining events in American history include experiences such as the

Great Depression, War World II, the civil rights movement, MTV, the World Wide Web, September 11th, and Hurricane Katrina. These events permanently affect individuals in fundamental ways. According to Lancaster and Stillman (2002), the influences of defining events can be powerful enough to create distinctive "generational personalities," which are believed to shape people's general outlook on life, and even the kinds of opportunities they desire from organizations. This suggests that public employees desire intrinsic nonmonetary opportunities because they have experienced defining moments that have cultivated a desire for these opportunities.

Consequently, empirical research offers some support regarding the influences of generational personalities on the work preferences of public employees. For example, Jurkiewicz and Brown (1998) asked a group of Generation Xers, Baby Boomers, and Veterans to rank 15 job characteristics on the basis of their desirability. This study revealed four meaningful differences. Generation Xers desired "chances to learn new things" more than Baby Boomers; Baby Boomers desired "freedom from supervision" more than Generation Xers; and Veterans desired "opportunities for advancement" and "chances to use special abilities" more than Generation Xers. Similarly, Bright (2007) found strong relationships between generational differences and the work preferences of public employees. He found that among public employees, Generation Xers desired personal recognition and leadership responsibility much more than did older generations.

Gender

The second factor that may affect the work preferences of public employees is gender. Statistics show that although women are more likely to enter the public-sector workforce, more men work in government than women, particularly in the federal government. Gender is important given the role expectations society assigns to us based on gender. Even though gender-role expectations have changed, a few traditional expectations remain. For example, in many segments of our society, it is still customary for males to be the leaders and breadwinners of their families and in the workplace. The effects of these values on public employees have been documented. For example, Bright (2007) demonstrated that female and male public employees differ in terms of their preferences for leadership responsibility. He found that male public employees desire leadership responsibility much more than their female counterparts.

Education Level

Educational attainment is the third factor that may affect public employees' work preferences. Statistics indicate that public employees are generally more educated than their private-sector counterparts. There are at least two reasons why education level may affect the work preferences of public employees. For one, education builds an expectation in employees that their work will be intrinsically rewarding. As employees' education levels increase, these employees expect to have access to career-advancement opportunities and meaningful job tasks. Second, the type of education that public employees receive may also impact their work preferences. Many public affairs degree programs actively seek to socialize students toward an ethic for public service and altruistic endeavors.

Race/Ethnicity

The fourth factor that may affect the work preferences of public employees is race/ethnicity. Statistics indicate that the public-sector workforce contains a large percentage of employees of color. Yet, many studies that have been conducted on the work preferences of public employees appear to have included mostly White participants. If this is the case, the results of these studies may not be representative of the entire public-sector workforce. This is an important issue because evidence shows some differences between the work preferences of employees of color and their White counterparts. For example, Bright (2007) found that employees of color desire career advancement significantly more than White employees. This finding is consistent with other studies that have shown that Black, Hispanic, and Native Americans are underrepresented at the top of most public organizations and overrepresented at the bottom of these organizations. This barrier prevents many employees of color from equal access to work opportunities. This line of reasoning suggests that public employees of color may be more interested in monetary opportunities than their White counterparts because of their unequal access to these opportunities.

Public-Sector Work Experience

Public-sector work experience is the fifth factor that may affect the work preferences of public employees, because it is related to the work opportunities that employees have access to. The longer employees work in the public sector, the clearer their understanding is of the opportunities available to them. This is important given the fact that public- and private-sector organizations differ in terms of the kinds of opportunities they can provide to their employees. Many business organizations are better equipped monetarily and thus can rely on monetary incentives as a motivational strategy. Public organizations, on the other hand, are believed to be better equipped to rely on intrinsic nonmonetary opportunities as a motivational strategy. Given these differences, one would expect employees with many years of experience in public organization to recognize that monetary opportunities are not readily available to them, and thus public employees may adjust their preferences to match the opportunities most often available. As a result, public employees may desire the intrinsic nonmonetary opportunities highly,

Socialization Experiences

A sixth factor that may affect the work preferences of public employees is the socialization experiences in public organizations. Organizational socialization is a process of "breaking in" new employees into an organization's culture. This process creates employees who internalize the goals of organizations and embrace available work opportunities. Employees who are fully socialized will desire certain opportunities because they fully believe these opportunities are valuable, regardless of the availability of other opportunities. Using this line of reasoning, public employees desire intrinsic nonmonetary opportunities because they have been convinced that these opportunities are most desirable, even if other opportunities, such as monetary opportunities are abundantly available.

Public-Service Motivation

Public-service motivation is the seventh factor that may affect the work preferences of public employees. Public service motivation has been characterized in many different ways, such as a service ethic, calling, or altruistic aims that motivate individuals to serve the public interest, help others, and be useful to society. Recently, Perry and Wise (1990) defined public-service motivation as an individual's predispositions to respond to motives that are grounded uniquely in public organizations and institutions. Many argue that employees with high levels of public-service motivation are attracted to nonmonetary opportunities, because they have innate altruistic needs that cannot be fulfilled by monetary opportunities and higher salary.

Recent research suggests that public-service motivation is a strong predictor of the intrinsic preferences of public employees. For example, Brewer, Selden, and Facer (2000) discovered four unique variations of public employees with high levels of public-service motivation. They labeled these varied employee groups as communitarians, humanitarians, patriots, and Samaritans. While each of these variations of public-service motivation had distinctive intrinsic work preferences, none was primarily motivated by monetary opportunities. Similarly, Bright (2005), using a sample of local government employees, found public-service motivation to be negatively related to the desires that public employees have for monetary opportunities.

Management Level

The eighth factor that may affect the work preferences of public employees, management level, is important because many studies regarding the work preferences of public employees focus primarily on managers. Yet, managers have distinguishing work characteristics that affect their work preferences. For example, managers occupy job positions that are higher in the hierarchy of organizations. They also generally receive greater levels of salary and monetary benefits than their nonmanagerial coworkers. Some have even argued that the most powerful motivational forces for employees who are lower in the organizational hierarchy may be the desire to have their lower level needs satisfied, which may lead them to desire extrinsic opportunities, such as monetary incentives, job security, and good fringe benefits much more than managers. Consequently, existing research supports this conclusion. Jurkiewicz and Massey (1997) found that when asked to rank the importance of 15 job factors, nonmanagers ranked higher salary as the third most important job factor, while managers ranked it as the eighth most important job factor. Similarly, Bright (2005) found that nonmanagers desired monetary opportunities significantly more than did managers.

FUTURE DIRECTIONS

Based on the existing research on intrinsic motivation in public organizations, there are a number of areas of research that can be conducted in the future. One area of future research can center on the impact that intrinsic opportunities have on the psychological needs of employees. More information is needed regarding the relationship between externally generated intrinsic opportunities and the need for self-determination. One of the few studies to investigate this issue was conducted by Eisenberger, Rhoades, and Cameron (1999). These scholars demonstrated that intrinsic rewards given for performance can positively satisfy individuals' needs for self-determination and competence. Additionally, future research could also investigate the extent to which monetary opportunities can fulfill individuals' higher level needs. While monetary opportunities can be considered an intrinsic opportunity from a need-based perspective, empirical research is needed on this issue. For example, a future study could investigate the degree to which opportunities for monetary incentives are related to public employees' needs for growth and accomplishments.

A second area of future research can center on the impact that intrinsic rewards have on employees' job performance. Many believe that the intrinsic aspects of the workplace have positive influences on the job performance of employees. However, more empirical research is needed on this issue. A study of this type could investigate the relationship between the performance of employees and the kinds of work opportunities they receive. For example, such a study could comparatively explore whether public employees who are primarily motivated by nonmonetary opportunities perform higher than private-sector employees who are primarily motivated with monetary incentives.

A third area of future research can center on the relationship between culture and the intrinsic preferences of public employees. Many people suggest that the race/ethnicity of employees is related to their work preferences. Public employees of color have been found to desire certain work opportunities, such as career advancement, significantly more than their White counterparts. Some have interpreted this finding to be an indication of discrimination practices in organizations that restrict the access that non-White employees have to certain kinds of work preferences, such as monetary incentives and career advancement. However, this interpretation may be wrong. Individuals of different racial groups may have different work preferences because they have different needs that are important to them. The importance of these needs may be influenced by their different cultural experience. A future study on this issue could investigate the importance that public employees of different cultural and racial groups assign to different psychological needs.

A fourth area of future research can center on the relationship between the socialization experiences of employees and their work preferences. One of the explanations for why public employees are attracted to intrinsic nonmonetary work preferences highlights their socialization experiences in public organizations. More information is needed regarding the extent to which socialization affects the work preferences of public employees. A future study could test this theory using longitudinal research. A longitudinal study is a study conducted over time. A study of this type could comparatively investigate the work preferences of a group of newly hired public- and private-sector employees over the course of 3 years. This study would help scholars and practitioners track and understand how the work preferences of employees change during the course of their employment.

A fifth area of future research can center on the relationship between public-affairs education and the work preferences of public employees. One of the explanations for why public employees desire intrinsic nonmonetary opportunities is because of their educational experiences. More information is needed regarding how an individual's education impacts his or her work preferences. A study that focuses on this issue could comparatively investigate the work preferences of students who graduated from MBA programs to see if these students have different work preferences than students who graduate from MPA programs.

RECOMMENDATIONS

A number of recommendations can be made for organizations seeking to capitalize on the value of intrinsic motivation. One of the first recommendations for organizations can center on routinely assessing the intrinsic preferences of their employees. Routinely assessing the preferences of employees provides organizations with current information regarding the types of intrinsic opportunities their employees find desirable. The value that employees place on intrinsic opportunities can change over time because of organizational and environmental shifts. Because of pos-

sible changes, it is imperative that organizations have current information regarding the types of intrinsic rewards employees find desirable. Additionally, assessing the intrinsic preferences of employees will also increase the understanding of how these preferences may change over employees' career spans. This information could be used to help managers make adjustments in the types of intrinsic reward opportunities they foster in their organization according to employees' work experience. This trend data would be valuable to researchers who are interested in understanding the intrinsic reward preferences of employees from a longitudinal perspective.

A second recommendation to organizations seeking to capitalize on the value of intrinsic motivation can center on increasing their capacity to foster various kinds of intrinsic reward opportunities. Organizations can build their capacity to foster intrinsic opportunities in two stages. In the first stage, organizations must determine which intrinsic opportunities are congruent with their goals and structure. Although public employees may desire a full range of intrinsic opportunities, it is important that each organization develop intrinsic opportunities that are compatible with its structure, goals, and processes. Intrinsic opportunities that are incompatible with the structure of organizations will be short lived. For example, it may not be effective for many public organizations to rely on monetary incentives as a motivational strategy, particularly since most public organizations are not fiscally equipped to rely on this strategy. In the second stage, once organizations have highlighted the intrinsic opportunities that are compatible, managers should be given the information and resources needed to implement these opportunities their organization.

A third recommendation to organizations seeking to capitalize on the value of intrinsic motivation centers on continually educating managers about the importance that intrinsic rewards have on employees' attitudes and behaviors. This information should be formally integrated into current management training programs. These training programs could provide aspiring managers with a broad overview of intrinsic motivation and explain why it is important. These programs should also inform managers of the types of intrinsic opportunities that their employees highly value based on the routine assessments of their employees' intrinsic preferences.

SUMMARY

This purpose of this chapter was to review intrinsic motivation from the perspective of public administration. Intrinsic motivation was defined as the energy that is produced from the satisfaction of individuals' psychological needs. A few examples of psychological needs that can produce intrinsic motivation are the needs for growth, interpersonal interaction, and self-determination. While there is much debate on this issue, it is the author's belief that employees' psychological needs can be satisfied with incentives such as professional development, money, career advancement, and personal recognition. Fostering these opportunities in organizations will not only satisfy the higher level needs of employees, but will also positively enhance the attitudes and behaviors of employees in organizations.

Furthermore, the research in public administration confirms the importance of intrinsic opportunities in public organizations. Even though monetary opportunities can be intrinsically rewarding, research has found that public-sector employees place less emphasis on these opportunities than do private-sector employees. In most cases, private-sector employees desired monetary opportunities significantly more than public-sector employees. Public-administration scholars have also shown that public employees highly desire many kinds of intrinsic nonmonetary opportunities, such as meaningful work, personal recognition, and professional development. Additionally, research has established that although public employees are generally less satisfied with their monetary opportunities, these attitudes are not related to their job satisfaction. Public employees' job satisfaction was mostly related to the intrinsic opportunities they receive from their organizations. Consequently, there are a number of potential explanations for the motivational characteristics of public employees, such as their age, gender, education level, race/ethnicity, public-sector work experience, socialization experience, public-service motivation, and management level.

Moreover, there are several areas of future research with regard to intrinsic motivation in public organizations. Future studies should provide the field with more information regarding the relationship between intrinsic opportunities and the psychological needs, job performance, culture, socialization experiences, and type of education of public employees. In addition, organizations seeking to capitalize on the value of intrinsic motivation should routinely assess the work preferences of employees, foster those opportunities that are compatible with the structure of their organization, and provide managers with the tools needed to implement these opportunities.

REFERENCES AND FURTHER READINGS

- Alderfer, C. (1972). Existence, relatedness, and growth: Human needs in organizational settings. New York: The Free Press.
- Argyris, C. (1957). *Personality and organization*. New York: Harper and Brothers.
- Barnard, C. (1968). *The functions of the executive*. Cambridge, MA: Harvard Press.
- Brewer, G., Selden, S., & Facer, L. (2000). Individual conceptions of public service motivation. *Public Administration Review*, 60, 254–264.
- Bright, L. (2007). Why do public employees desire intrinsic non-monetary opportunities? *Public Personnel Management*.
- Bright, L. (2005). Public employees with high levels of public service motivation: Who are they, where are they, and what

- do they want? *Review of Public Personnel Administration*, 25, 138–154.
- Cameron, J., & Pierce, W. (1994). Reinforcement, reward, and intrinsic motivation: A meta-analysis. *Review of Educational Research*, 64, 363–423.
- DeCharms, R. (1968). *Personal causation*. New York: Academic Press
- Deci, E. (1975). Intrinsic motivation. New York: Plenum Press.
- Deleon, L., & Taher, W. (1996). Expectations and job satisfaction of local-government professionals. *American Review of Public Administration*, 26, 401–416.
- DeSantis, V., & Durst, S. (1996). Comparing job satisfaction among public and private sector employees. *The American Review of Public Administration*, 26, 327–343.
- Eisenberger, R., Rhoades, L., & Cameron, J. (1999). Does pay for performance increase or decrease self-determination and intrinsic motivation? *Journal of Personality and Social Psychology*, 77, 1026–1040.
- French, W., & Bell, C. (1999). Organizational development: Behavioral science interventions for organization improvement (6th ed.). New Jersey: Prentice Hall.
- Goldstein, K. (1995). The organism: a holistic approach to biology derived from pathological data in man. New York: Zone Books.
- Hackman, R., & Oldham, G. (1975). Development of the Job Diagnostic survey. *Journal of Applied Psychology*, 60, 159–170.
- Herzberg, F. (1973). *Work and the nature of man*. Cleveland, OH: The World Publishing Company.
- Houston, D. (2000). Public service motivation: A multivariate test. *Journal of Public Administration Research and Theory*, 4, 713–727.
- Jurkiewicz, C., & Brown, R. (1998). GenXers vs. Boomers vs. Matures. Review of Public Personnel Administration, 18, 18–37.
- Kanfer, R. (1990). Motivational theory and industrial and organizational psychology. In M. D. Dunnette & L. M. Hough (Eds.), *Handbook of industrial and organizational psychology* (pp. 75–170). Palo Alto, CA: Consulting Psychologists Press.
- Kilpatrick, F., Cummings, M., & Jennings, M. (1964). *The image of the federal service*. Washington, DC: The Brookings Institution.
- Lancaster, L., & Stillman, D. (2002). When generations collide: Who they are, why they clash, how to solve the generational puzzle at work. New York: HarperBusiness.
- Likert, R. (1967). *The human organization. Its management and value*. San Francisco: McGraw-Hill.
- Maslow, A. (1943). A theory of human motivation. *Psychological Review*, 50, 370–396.
- McGregor, D. (1960). *The human side of enterprise*. New York: McGraw-Hill.
- Newstrom, J., Rief, J., & Monczka, R. (1976). Motivating the public employee: Fact vs. fiction. *Public Personnel Management*, *5*, 67–72.
- Perry, J., & Wise, L. (1990). The motivational basis of public service. *Public Administration Review*, 50, 367–373.
- Rainey, H. (1982). Reward preferences among public and private managers: In search of the service ethic. *American Review of Public Administration*, 16, 208–302.
- Taylor, F. (1916). *Principles of scientific management*. New York: Harper and Brothers.

- Thomas, K. (2000). *Intrinsic motivation at work: Building energy and commitment*. San Francisco: Berrett-Koehler.
- Weisbord, M. R. (1987). *Productive workplaces: Organizing and managing for dignity, meaning, and community.* San Francisco: Jossey-Bass.
- White, R. (1959). Motivation reconsidered: The concept of competence. *Psychological Review*, 66, 297–333.

CROSS-REFERENCES

Human Resources Management in the 21st Century (55) Diversity and Diversity Management in the Age of Globalization (64) Aging and Work Motivation (66)

Motivating Individuals and Groups at Work in the 21st Century (68) Why Self-Set Goals May Sometimes Be Non-Motivating (70)

WHY SELF-SET GOALS MAY SOMETIMES BE NON-MOTIVATING

Maika Rawollem, Juergen Glaser, and Hugo M. Kehr *Technical University of Munich*

oals are anticipated positive future states or events which a person strives to achieve. The terms *aim*, *objective*, and *standard* are widely used synonymously. Other related concepts, however, like *intention*, *norm*, and *task* can be distinguished from goals because they emphasize the action itself rather than the anticipated future state.

The importance of a goal for motivated action is beyond doubt. Action theories, for instance, use *goal* as the key element for defining *action*—their object of interest. Many motivation theories also see goals as key elements and illustrate their motivational effect with a metaphor: The goal "pulls" the action.

Goals are seen as an effective means for promoting motivation and are therefore used as an instrument for leading and motivating people. Locke and Latham's (1990) goal-setting theory is based on the assumption that the motivational effects of performance goals mainly determine a person's performance on work-related tasks. An application of this notion can be seen in Management by Objectives (MbO), a popular leadership method that aims at transforming a company's strategic goals into individual goals. It is

expected that inasmuch as an employee accepts and adopts the negotiated goals, he or she will be better oriented and more motivated than without a goal.

Nevertheless, if we are to explain motivation, it is not sufficient to study the goal and its features alone. It is important to additionally consider the characteristics of the person, since the value and motivating power of a given goal depends heavily on the specific needs of the person. Kehr's (2004b) compensatory model of work motivation and volition, for instance, states that a goal should match the person's basic needs and motives in order to be motivating. To complicate the issue further, some related approaches emphasize that a goal should also fit in with the other goals for which the person strives.

By discussing the aforementioned approaches, this chapter will highlight the motivating potential of goals but also explain why goals may sometimes also lose their motivating force. To introduce the topic and to bridge the gap between theory and practice, we will begin by presenting a case study. The case starts by introducing Peter, the protagonist, who has a goal. We would therefore expect

him to be highly motivated to pursue his goal. Alas, Peter feels thoroughly demotivated. What could be the reasons for the lack of motivating power of Peter's goal? To develop possible answers to this question, we will scrutinize Peter's situation more closely, and by referring to various theoretical frameworks, we will show under which conditions goals can lose their motivating potential. Our line of argument will proceed as follows: We will begin by focusing on Peter's salient goal and investigate the characteristics of this goal. Next, we will include other preexisting goals, which will enable us to discuss the potentially complex network into which Peter's prevalent goal may be integrated. We will then examine some specific goalrelevant characteristics of the person: motive dispositions and volitional strength. As a final step of our analysis, we intend to broaden the view to include potentially relevant situational aspects. As a tentative solution to Peter's problem, we will present two alternative sources of motivation: incentives that result from performing the activity itself and visions.

CASE STUDY: PETER, THE SALES AND MARKETING MANAGER, FEELS UTTERLY DEMOTIVATED

Peter Dell, an energetic, outgoing business graduate, started his career as a sales and marketing manager in the pharmaceutical and life science industry 6 years ago. He successfully helped his company, a San Francisco–based start-up firm, to build a countrywide sales network. A couple of months ago, his supervisor Don called him into his office to tell him about the company's new strategic plan to expand its sales activities into Central America. Don asked Peter whether he wished to manage this ambitious project. Peter was initially worried, but Don managed to quash these worries by offering him a promotion to the position of Senior Vice President Central America, along with a substantial pay rise. Finally, Peter and Don agreed upon an initial assignment of 12 months.

Peter took up his new role 3 weeks ago. With only a few suitcases of personal belongings and business-related materials, but without his family, he left for Costa Rica, the company's new hub in Central America. However, shortly after arriving in his new, appealing office in Costa Rica, Peter began to loose his drive. Now, after only 3 weeks in the country, he feels utterly demotivated. Day after day, he sits in his office and has no energy whatsoever to make plans or contact people in order to build networks. Never before has he experienced anything like what now appears to be a total loss of morale and stamina.

Does Peter Have a "SMARTCH" Goal?

First, let us focus on the goal itself. The starting point is the observation that people with roughly the same abilities and knowledge may nevertheless show substantial differences in their task performance. The reasons for such differences are seen in the fact that more successful people often have a goal. Their goal can motivate them to maximize their performance by influencing three dimensions of motivated action: direction, intensity, and duration. First, goals direct behavior toward actions that are necessary to reach the goal. Second, goals determine the intensity of effort that is invested in goal achievement. Third, goals determine, especially when no time limit is imposed, the duration of effort.

A plethora of empirical studies have identified two specific features of goals which are especially relevant for high performance: goal specificity and goal difficulty. Locke and Latham's (1990) goal-setting theory hence states that specific and difficult goals, in general, lead to high performance. This is because people tend to match the labor they invest in goal achievement with the difficulty of the goal. Thus, they compensate higher goal difficulty with greater effort. The situation is similar for goal specificity: If a goal is not specific (e.g., a "do-your-best" goal), it is much easier to prematurely get the false impression that the goal might have already been reached.

In line with the goal-setting theory, many management-training programs preach that goals should ideally be "SMART." The acronym SMART stands for the attributes of an "ideal" goal: specific (specifying the what, why, and how), measurable (availability of criteria for assessing progress and success), attainable (the goal is not out of reach), realistic (availability of required skills, resources, and time), and timely (clearly set time frame). Ideally, the aforementioned attributes should be supplemented by the attribute *challenging* (leading to the less catchy yet more correct acronym "SMARTCH"), as the impression of being challenged by a goal clearly also adds to the motivating potential of a goal.

Let us get back to our case. When examining Peter's main objective, namely to enter the market of Central America and establish a valuable network of partners and customers, this goal may possibly not be SMARTCH. On the contrary, Peter's aim to go to Central America might rather be abstract, complex, hard to measure, not timely defined, perhaps not attainable and hence not realistic, and consequentially not even challenging.

A further fundamental determinant of goal-related performance is goal commitment. High goal commitment means that the person considers the goal significant, is determined to achieve it, is emotionally involved, and does not give up in the face of difficulties. With regard to our case study, even if Peter might actually have a specific and difficult goal (e.g., to organize a show at a Costa Rican trade fair within 4 weeks in order to increase the brand awareness of the company), this alone might not be sufficient to motivate Peter. He would also need to be convinced of the necessity of the trade show and, hence, to be committed to this assignment.

Lastly, commitment to specific and difficult goals is not sufficient for high performance: Additionally, the person needs to have the required skills and abilities. Goal-setting theory allows for this by declaring ability and self-efficacy (the abilities a person subjectively believes him- or herself to have; Bandura, 1977) to be critical conditions of task performance. If Peter did not have, or did not believe to have, the required abilities to enter the Costa Rican market, he would probably not even try to reach this difficult and complex goal. In this case, first setting short-term and non-specific goals (i.e., to begin by contacting some potential customers) might help him to build up abilities and (through an early sense of success) to also increase his trust in his abilities.

In sum, a closer analysis of Peter's goal has shown why Peter, despite of having a goal, might feel increasingly demotivated. All of the goal characteristics mentioned above are potential reasons for Peter's lack of motivation and may have partly caused the current loss of energy and stamina.

Does Peter's Goal Cause Conflicts With His Other Goals?

After having discussed the motivational mechanisms of the goal itself, we will now allow for the complexity of reality. Usually, a person has a complex system of several goals, which ideally harmonize but might also conflict with each other and cause intrapersonal goal conflicts. Such intrapersonal goal conflicts occur when striving for one valued goal interferes with attaining another desired goal, or when a decision between some incompatible alternatives is required.

With regard to intrapersonal goal conflicts, it is necessary to consider the valence of the goal at hand, which is characterized through two opposing poles—positive versus negative valence. Positive valence refers to appealing, attractive facets of the goal, initiating approach tendencies. Negative valence, by contrast, marks repelling goal aspects, causing avoidance tendencies. Taking into account the fact that both positive and negative valences might be combined within one goal, Lewin (1931) formed a conflict taxonomy that distinguishes between three types of intrapersonal conflicts. Approach-approach conflicts arise if a person has to decide between two appealing but incompatible alternatives (i.e., Peter wants to be with his family and friends, but he also wants to complete the project in Costa Rica). Approach-avoidance conflicts occur if an option has positive as well as negative aspects (i.e., Peter wants to experience a new culture but is also afraid of behaving and acting in the wrong way). Finally, avoidance-avoidance conflicts describe the choice between two disliked opportunities (i.e., Peter's choice between two unfavorable alternatives: either to persevere in Costa Rica far away from his family and friends or to give up and admit defeat).

Of course, intrapersonal goal conflicts can be supplemented by similar types of interpersonal (social) conflicts. Indeed, in real life, goal conflicts are even more complex, since we are embedded in a social network of relationships (i.e., one's boss, colleagues, partner, family, and friends),

all of which embrace different roles and demands. Roles result from the expectations of society regarding appropriate behavior in a particular position. If individuals engage in multiple incompatible roles, contradictory role pressures lead to a role conflict. Work- and family-related role conflicts are prominent examples of this in the current literature on organizational behavior.

Irrespective of whether they are caused by interpersonal expectations or intrapersonal desires, conflicts among goals can have detrimental effects on goal attainment (due to decreased action and increased rumination about the conflicting strivings) and may lead to negative affect, depression, and psychosomatic complaints (Emmons & King, 1988). Moreover, Kehr (2003) showed that preexisting goal conflicts which persevere over time might also impair the attainment of *newly* set goals. This might be due to dysfunctional thought processes absorbing attention resources. However, a positive side effect may be that a person, when identifying goal conflicts, may feel the need to clarify and reprioritize his or her goals. This is a step in personality development and fosters and ultimately enhances the person's coping resources relevant for future conflict resolution.

In order to analyze Peter's situation from the perspective of conflicting goals and roles, it is crucial to look at all of the aspects that Peter might have taken into consideration when making his decision whether to go to Costa Rica. Don, Peter's boss, had resolved his initial doubts and convinced him to accept the foreign assignment by offering a promotion to the position of Senior Vice President Central America. But what might have been the reasons for Peter's initial worries? His thoughts after 3 weeks in Costa Rica might provide an answer here. Peter might be facing a strong work-family conflict. He might be missing his wife and his daughter, who are unable to visit him due to work and school obligations. This might be additionally exacerbated by increasingly tense telephone conversations with his wife, who feels abandoned and overburdened by the situation. Thus, Peter might be torn between his love and responsibility for his family and his desire to master the demands of his job. Moreover, he might possibly be experiencing a strong conflict between the initial expectation of furthering his career through this assignment and the opposite effect that has actually emerged—namely, the endangerment of his career. All of these conflicts might be occupying his attention and energy resources, making him feeling depressed and tired, and absorbing his initial motivation.

Does Peter's Goal Cause Conflict With His Needs?

This section will investigate which further characteristics of a person moderate the motivational potential of goals. Intuitively, one would expect that achieving a personal goal leads to satisfaction and well-being. However, Brunstein, Schultheiss, and Grässmann (1998) were able to show that this is not always the case. People who pursue

goals which are not in line with their latent motives are less satisfied even if they reach their goals. Continuing motive-incongruent behavior, can cause intrapersonal conflicts in terms of contradictory behavioral tendencies. This may than impair performance, well-being, and health.

But why do people pursue goals that are not in line with their underlying motive pattern? McClelland, Koestner, and Weinberger (1989) attempted to answer this question by postulating two different types of motives, implicit and explicit motives. Implicit and explicit motives are related to different characteristics of the person and are therefore empirically largely uncorrelated. Implicit motives are subconsciously aroused through certain situational cues and cause affective preferences and unconscious behavioral impulses. Commonly, implicit motives are thematically classified into the big three: affiliation (i.e., building and maintaining close social relations), achievement (i.e., meeting or exceeding personal standards of excellence), and power (i.e., seeking social influence, status, and dominance).

As implicit motives are not consciously represented, they cannot be assessed with self-report techniques. Hence, McClelland (1987) stated, "A scientist cannot believe what people say about their motives" (p. 11). The underlying notion is that many people are unaware of their implicit motives. Thus far, the only approach for accessing a person's implicit motives is to systematically analyze the affective preferences and spontaneous behavioral impulses of that person with a projective assessment tool such as the Thematic Apperception Test (TAT; Murray, 1943). The TAT uses ambiguous pictures and asks the person to write an interesting and novel story about what might have happened in the scene depicted on the picture. Here, the scene on the picture is meant to arouse the person's implicit motives. Implicit motive strength is then reflected in the thematic content of the person's fantasy story. An alternative method of measuring implicit motives is the emotion diary, which assesses the feelings of a person throughout a day. Situations that mostly release positive emotions and are experienced as enjoyable signify congruence with one's implicit motives. If, for instance, Peter mainly had positive emotions in situations associated with him leading and influencing people, he would probably have a strong implicit power motive.

Explicit motives, in turn, represent the person's self-ascribed motives. They are activated by social cues (i.e., expectations of the social environment) and cause cognitive preferences, which result in explicit action tendencies. As they are explicit, they can be assessed by self-report techniques. Analogously to implicit motives, explicit motives can also be classified into motive categories.

In spite of the conceptual independence of the two systems, the manner in which they interact has significant consequences for a person's emotional well-being, behavioral efficiency, and performance. If a person's explicit motives do not align with his implicit motives, he may have cognitive preferences and goals that conflict with his affective preferences and needs. To achieve these goals, the person

consequently has to struggle against conflicting implicit behavioral tendencies. If, in turn, he is able to become aware of his affective preferences and attains congruence with his consciously built cognitive preferences, he will have increased affective support for his actions. Unfortunately, the possibility of conflicts occurring between implicit motives and explicit goals is high, because people are often (a) unaware of their implicit motives and (b) highly influenced by others when formulating explicit goals. The two aspects are intertwined, and they may exacerbate one another.

What implications does this have for Peter Dell? Setting motive-congruent goals requires self-awareness and sensitivity to one's own affective preferences—a process that is easily distracted by social and normative pressure. Like many people, Peter might have been unaware of his implicit motives. Let us assume that Peter has thought himself to have an achievement motive, but in fact, he might rather possess a high implicit power motive. This false impression of his own implicit motives might have additionally been consolidated by the impact of his boss, who tried to persuade him, leading him to accept the achievement-oriented goal of managing the project. However, having to start from scratch in a foreign country might frustrate rather than fulfill Peter's implicit power motive.

The issue is further complicated by the fact that people have not only approach motives (i.e., hope of success, hope of control, and hope of affiliation), but also fear motives (i.e., fear of failure, fear of loss of control, and fear of rejection). It is therefore possible that Peter has strong fear motives of which he was not consciously aware or which he simply ignored while building his goals. Now, sitting all alone in Costa Rica, his fear motives (e.g., fear of loss of control) might be aroused, causing avoidance tendencies, which in turn might additionally be responsible for Peter's demotivation.

Therefore, Peter's increasing demotivation may result from an underlying conflict between his explicit goals and his dispositional motives. This mismatch between his goals and affective preferences (which stem from aroused implicit motives) may cause unwanted behavioral impulses, making goal-related action become dissatisfying and aversive. In the next paragraph, we will take a closer look at Peter's psychological response to the presumed motive-goal conflict.

How Does Peter Succeed in the Face of Hindering Impulses?

Kehr's (2004b) compensatory model of work motivation and volition leads to the proposition that volitional mechanisms are required in order to overcome motive-goal conflicts such as those described above. Volition is defined here as an array of self-regulatory strategies to support goals against competing behavioral impulses from aroused implicit motives. Therefore, volition compensates for lacking or insufficient motivation, hence the name of the model. Examples of volitional strategies include motivation control (i.e., developing positive fantasies, e.g., imagining a happy ending), emotion control (i.e., lifting one's mood, e.g., by going out for drinks), and attention control (i.e., focusing one's attention on the task at hand). Clearly, volition is an important means for keeping one's course of action on track in the face of motivation-related difficulties. However, volitional self-regulation does have several disadvantages.

First, volitional self-regulation is experienced as strenuous. It is not fun to volitionally support a difficult goal (i.e., staying in Costa Rica to pursue the project) against one's competing impulses from aroused implicit motives (i.e., going home to one's family). From early research on the delay of gratification (the famous "cookie experiments"), videos vividly document the unease and discomfort children are having when trying to refrain from eating a cookie. Thus, continuously overemphasizing cognitive preferences at the expense of affective preferences may impair a person's well-being.

Secondly, research has shown that people differ in their ability to control their behavior volitionally. The proficiency in using volitional strategies has been labeled "volitional strength" or "self-control strength" (Kehr, 2004a; Muraven & Baumeister, 2000). Effective volition requires the development and appliance of strategies that are appropriate to the situation. Motivation control (e.g., imagining the project being a great success), for instance, might not be appropriate if, realistically, the chances of successful project fulfillment are slim.

Moreover, a person's volitional strength may be decreased as a result of extensive volitional activity. Muraven and Baumeister (2000) showed this with a series of intriguing experiments. This led to a resource-based concept of volitional strength reflecting the fact that volitional acts may consume and ultimately exhaust volitional resources. In a related field study, Kehr (2004a) showed that high discrepancies in managers' implicit and explicit motives (e.g., Peter thinks he is highly achievement motivated, but actually has a high implicit power motive) also leads to decreased volitional strength, which is in turn responsible for subsequent frustration and a lowered well-being.

Finally, Kuhl's (2000) work led to the assumption that two different modi of volitional activity need to be distinguished: a functional mode of volitional activity, which he called self-regulation, and a dysfunctional, rigid mode of volition called self-control. Self-regulation largely corresponds to the concept of volition described previously. Kuhl's notion of self-control, by contrast, is an authoritarian, self-disciplined style of action control. It comprises, among other things, impulse control (i.e., suppressing implicit impulses), intention control (e.g., Peter might constantly think about his duties), overplanning (e.g., Peter might spend too much time on planning instead of starting to act), and negative fantasies related to failure (e.g., Peter might think about being dismissed if the project fails). In principle, self-control is helpful for pursuing goals with high priority that are not embedded in the personal need

structure. This is typically the case for goals imposed by others. Nevertheless, operating in the self-control mode can be maladaptive, partly because it involves negative emotions and a high amount of conscious effort. Therefore, cognitive capacities that might be used for other task-related activities are blocked and goal achievement becomes stressful. Moreover, if a person ignores unwanted and distracting behavioral impulses (e.g., if Peter ignores his impulse to spend more time communicating with his children at home), then the person foregoes opportunities to satisfy his or her needs, resulting in feelings of frustration.

Seen in this light, it becomes clear that the presumed conflict between Peter's explicit goals and his dispositional motives requires volitional strength to compensate for the lack of motivation. It is possible that Peter has limited volitional strength in that he may be unskilled in employing the appropriate volitional strategy or in flexibly shifting strategies. Moreover, Peter's attempts to deal with his insufficient motivation volitionally may in fact have depleted his volitional resources and thus aggravated the problem further. With increasing problems and depleting volitional strength, there is a likelihood of him slipping into the rigid self-control mode in which he simply forces himself to keep going through a rigid planning of actions (e.g., he strictly plans every step without allowing any flexibility for spontaneous actions) and negative fantasies. This may again block important cognitive resources and arouse his fear motives, causing aversive and distressed feelings.

Does Peter Face External Barriers or Obstacles?

In terms of the issue of optimal external conditions of goal achievement, action theories such as the theory of action regulation (Frese & Zapf, 1994; Hacker, 1994) can provide valuable ideas. Indeed, the goal constitutes a key element of action regulation, providing a point of reference for the continuing reappraisal of current results. Since action theorists conceive human actions to be hierarchically structured and therefore to require regulation on different cognitive levels, different goal levels can be distinguished: values; superior, long-term goals (e.g., to have a successful career); subordinate, short-term goals (e.g., to successfully conclude the project); and subgoals (e.g., to formulate a project plan). Discrepancies between the given result and the defined goal will immediately initiate a new operation intended to ultimately achieve the goal. Thus, the goal concept here integrates motivational (the goal energizes or pulls the action) and cognitive (the goal as point of reference) functions in the process of action regulation.

External working conditions may promote or impair this action regulation process. Regulation problems can be divided into regulation obstacles, regulation uncertainty, and overtaxing regulations. Regulation obstacles, which aggravate or even impede goal achievement and action regulation, include regulation difficulties (e.g., a lack of information), and unpredictable interruptions. Regulation uncertainty occurs if a person does not know how to achieve a goal, which can be due to insufficient or delayed feedback, role ambiguity, or role conflicts. Finally, overtaxing regulations refer to excessive demands regarding the speed (time pressure) and intensity (concentration requirements) of regulation. Such regulation problems can lead to work stress (in terms of additional or increased effort, and a tendency to take risky action), to second-order outcomes such as psychophysical strain, and hence may undermine the positive effects of goals.

Regarding our case study, Peter Dell may be confronted with several adverse factors impeding his action regulation. First, the superior, long-term goal (to develop a foreign market) may not be adequately subdivided into subordinate, short-term goals and a suitable action plan. Second, Peter may be confronted with certain learning barriers, for example having to become acquainted with the local inhabitants without having a sufficient command of the language. Third, unfavorable performance conditions (e.g., frequent interruptions from telephone calls in his office) may lead to additional effort and impede proceedings in his daily work tasks. Fourth, he may face a lack of information regarding the local market as well as social and business-related conventions. This information deficit may be additionally complicated by a lack of feedback about his performance and give rise to considerable feelings of uncertainty regarding how to act in terms of the project and how to interact adequately with his team, customers, and business partners. Taken together, these aversive working conditions would probably impede Peter's capability for a successful action regulation, which otherwise might have been adequately guided and motivated by his goals.

MOTIVATION IS NOT ALL ABOUT GOALS—IT IS ALSO ABOUT DOING SOMETHING JOYFULLY

Up to here, this chapter has focused strictly on goals. Does my goal fulfill the SMARTCH criteria? Does it harmonize with my implicit motives as well as with the rest of my goals? Do I have optimal external conditions in order to succeed? All of these questions refer to important aspects regarding the issue of whether goals are motivating or not.

Let us now change the perspective. Thus far, this chapter might have conveyed the false impression that human beings are merely rational, calculating creatures who act with the sole intention of reaching their ultimate goals. In order to adjust this impression, we need to leave behind the somewhat limited view on personal goals as being the only motivating agent. The goal-based concept of motivation has to be supplemented by a new approach, namely the notion of activity-based incentives (Rheinberg, 1989), which means that an activity itself may be so enjoyable that it becomes its own purpose. In such a case, a person does something merely for the sake of doing it, not as a tool

for reaching a specific goal in the future. Activity inherent incentives allow people to be highly motivated, to engage themselves enthusiastically, and to continuously improve their competences in activities without being dependent on volitional skills or the existence of rational goals.

Undoubtedly, this seems to be a charming idea, but what determines whether an activity offers such inherent incentives? As is usually the case, it depends on the person, or better, on the person's implicit motives. These can be aroused by thematically congruent situations and influence the degree to which a certain situation is experienced as attractive and enjoyable.

In this respect, the concept of activity inherent incentives aligns with the concept of intrinsic motivation (for a critical review of different approaches to intrinsic motivation, see Rheinberg, 2006). Intrinsic motivation describes a behavior that is carried out for its own sake, whereas extrinsic motivation describes a behavior that is aimed at reaching a benefit which is not included in the activity itself (e.g., a bonus for successful project management). Kehr (2004b) advocated a similar notion of intrinsic motivation. Using the example of playing children, he illustrated that intrinsic motivation does not depend upon the existence of a goal. Conversely, intrinsic motivation simply requires (a) that the action is thematically congruent with the person's aroused implicit motives and (b) that no thematically incongruent cognitive preferences (which would undermine one's intrinsic motivation) exist at the same time. Additionally, Kehr asserted that if thematic congruence between implicit and explicit motives is combined with adequate perceived abilities, the person will experience flow (Csikszentmihalyi, 1988). Flow experience, a specific form of intrinsic motivation, is characterized by full attention to the task, impeded sense of time, and an absence of intrapersonal conflict and self-referential or other disturbing thoughts.

Therefore, awareness of one's implicit motives is not only important for choosing motive-congruent explicit goals; it is also essential for selecting motive-congruent activities offering activity inherent incentives.

Schultheiss and Brunstein (1999) developed a visualization technique which can help to detect motive-congruent activities. Using this technique, complex plans are subdivided into action steps. The person then anticipates and visualizes how he or she would realize each action step. The visualization triggers affective responses. Positive affective responses (which result from aroused implicit motives) signal motivational support. Hence, action steps associated with positive affect are likely to offer activity inherent incentives. Clearly, in business, it is unlikely or virtually impossible that one will always select projects and tasks which fit in with one's own preferences and motives. People will often be forced to deal with situations that seem to be incongruent with their personal needs. In such cases, reframing can be a useful technique. Here, reframing means putting the current situation into a new frame—generally the broader picture. Framing the current activity in a broader picture generally increases the potential of the situation to arouse one's implicit motives and therefore to satisfy one's personal needs.

How can these ideas be transferred to Peter's situation? Assuming that Peter had a strong implicit power motive, he would be motivated in situations in which he can exert influence and control other people. But all alone in Costa Rica, he may have lost most of his connections and influence while not yet having established a local network. Moreover, Peter's authority in his team may currently be low due to his lack of intercultural competence and language skills. Thus, the reason for the motivational slack he is currently experiencing may be a change in his functions—his activities may no longer be fueled by his implicit power motive.

To overcome his lack of motivation, Peter could use volitional strategies which compensate for insufficient intrinsic motivation (Kehr, 2004b). However, a more profound strategy would be to strengthen his intrinsic motivation by reorganizing his functions and projects in order to achieve a maximum amount of need congruence. Here, the visualization technique described above might help. Peter might visualize single project steps and feel the affective responses. He should choose projects that give rise to positive affective responses during the visualization because these indicate motivational congruence.

If, however, Peter is forced to deal with a motive-incongruent project, he might use the reframing technique mentioned above. Having a high implicit power motive, he might emphasize the impact and status-related facets of his new position (i.e., the chance to make important contacts in Costa Rica, to gain influence and status by successfully establishing this branch, and to reinforce his authority in the team). This reinterpretation might give rise to a better congruence with his affective preferences and therefore allow him to experience his job as more satisfying and enjoyable.

THE VISION: MOTIVATION TOWARD A HIGHER PURPOSE

Finally, let us introduce another motivational alternative to goal setting: the vision. In organizational contexts, a vision can be defined as an idealized image of the future representing shared values and purposes.

In terms of what is known about the characteristics of effective goals, a vision seems to be merely a deficient goal. Indeed, a vision might be experienced as challenging but hardly ever meets any of the SMART criteria: A vision does not represent a detailed picture of the aspired outcomes with precise information about estimated steps, time lines, and measurable indicators of success. However, the second glance may reveal that a vision is not just a deficient goal—indeed, it is quite the opposite: A vision inspires, motivates, and orients people, even, or especially, in those situations in which no specific goals are defined or in which goals turned

out to be unfeasible. An appealing vision is known to be a crucial element of outstanding leadership, especially through enhancing follower motivation (Sosik, Kahai, & Avolio, 1999). Strange and Mumford (2002) formulated five mechanisms mediating the influence of visions on the follower's actions: First, the future image expressed in a vision indicates the venture's direction, idea, and uniqueness. Second, visions orient actions and efforts toward a set of evocative goals. Third, visions support the feeling of identification and meaningfulness. Fourth, visions provide a general structure for the integration and coordination of activities, and finally, visions formulate beliefs that are fundamental for the development of corporate norms and structures.

Comparing goals and visions, goals operate on a conscious cognitive level, and they are based on rational facts. A vision, by contrast, is image based and seems to affect a person more unconsciously and emotionally. Furthermore, goals set a definite time frame and influence specific rational choices, whereas visions operate from a long-term perspective with a vague time frame and offer a global point of reference. All of these characteristics represent strong analogies to the dichotomy of implicit and explicit motives. If we additionally consider that personal goals are related to a person's explicit motives (see Kehr, 2004b), it is likely that the effects of visions are based on the arousal of implicit motives. Despite the fact that this notion has not yet been empirically studied, we propose that a motive-congruent vision can arouse one's implicit motives and hence increase one's motivational energy. This effect may add to the effect of goals or, if strong enough, even compensate for the absence of specific goals.

What implications does this have for Peter Dell? As described above, Peter may suffer from an incongruence of his implicit motives and his explicit goals. As a consequence, Peter's goals may have lost their motivational potential. It may now be useful to develop a vision as a new and global orientation point. Peter, with his presumably high implicit power motive, might be tempted to develop a vision such as, "I will be the tycoon of Costa Rica-influential and admired." In terms of the distinction between the personalized power motive, in which impact is mainly used for one's own self-interest, and the socialized power motive, which in turn relates to pursuing goals for the benefit of others (McClelland, 1973), it seems likely that this vision would arouse Peter's personalized power motive. However, this might lead to negative reactions from his social environment. Hence, a more suitable vision might rather be aligned with Peter's socialized power motive. It could stress the application of personal influence in helping the company to succeed or in supporting associates in building their abilities. Such a vision might also arouse Peter's implicit power motive and give him new inspiration and motivation without producing negative reactions by others. A vision might also reestablish the experienced meaningfulness of his goals. Peter might also arrange his goals as steps on his path toward reaching the vision. Therefore, a vision might restore the motivational potential of Peter's proximal goals and help to revive his drive, satisfaction, and identification with his objectives.

CONCLUSION

To summarize this chapter, setting motivating goals clearly requires the consideration of a complex network of conditions: whether the goal meets concrete demands (i.e., a goal should be specific, measurable, attainable, realistic, timely, and challenging); whether it harmonizes with other personally relevant goals and, even more important, with the person's implicit motives, needs, and preferences; whether the person has a command of regulatory strategies for supporting goals in the face of competing impulses and preferences; and whether external situational conditions support goal attainment.

This highlights how important it is not only to avoid blind acceptance of goals imposed by others (this is common sense), but also to choose one's own goals very carefully. As illustrated by the case of Peter Dell, commitment to the wrong goals may not only destroy their motivational potential and lead to reduced performance; it might also cause substantial damage to one's personal well-being and satisfaction.

Therefore, we wish to emphasize the value of (a) self-awareness about one's own needs and preferences, (b) anticipation of possible conflicts with other goals or hindering external conditions, and (c) having the courage to sometimes admit that a goal may simply not be suitable for one-self. And finally, it should not be forgotten that goals are not the only motivating agents: People can also be motivated by an enjoyable and satisfying activity, as well as by a grand and moving image of the future—a vision.

REFERENCES AND FURTHER READINGS

- Bandura, A. (1977). Self-efficacy: Toward a unifying theory of behavioral change. *Psychological Review*, 84(2), 191–215.
- Brunstein, J. C., Schultheiss, O. C., & Grässmann, R. (1998).
 Personal goals and emotional well-being: The moderating role of motive dispositions. *Journal of Personality and Social Psychology*, 75(2), 494–508.
- Csikszentmihalyi, M. (1988). The flow experience and its significance for human psychology. In M. Csikszentmihalyi & I. S. Csikszentmihalyi (Eds.), *Optimal experience: Psychological studies of flow in consciousness* (pp. 15–35). New York: Cambridge University Press.
- Emmons, R. A., & King, L. A. (1988). Conflict among personal strivings: Immediate and long-term implications for psychological and physical well-being. *Journal of Personality and Social Psychology*, *54*(6), 1040–1048.
- Frese, M., & Zapf, D. (1994). Action as the core of work psychology: A German approach. In H. C. Triandis, M. D. Dunnette, & L. M. Hough (Eds.), *Handbook of industrial and organizational psychology* (Vol. 4, pp. 271–340). Palo Alto, CA: Consulting Psychologists Press.

- Hacker, W. (1994). Action regulation theory and occupational psychology: Review of German empirical research since 1987. *German Journal of Psychology*, 18(2), 91–120.
- Kehr, H. M. (2003). Goal conflicts, attainment of new goals, and well-being among managers. *Journal of Occupational Health Psychology*, 8(3), 195–208.
- Kehr, H. M. (2004a). Implicit/explicit motive discrepancies and volitional depletion among managers. *Personality and Social Psychology Bulletin*, *30*(3), 315–327.
- Kehr, H. M. (2004b). Integrating implicit motives, explicit motives, and perceived abilities: The compensatory model of work motivation and volition. *Academy of Management Review*, 29(3), 479–499.
- Kuhl, J. (2000). A functional-design approach to motivation and self-regulation: The dynamics of personality systems and interactions. In M. Boekarts, P. R. Pintrich, & M. Zeidner (Eds.), *Handbook of self-regulation* (pp. 111–169). San Diego, CA: Academic Press.
- Lewin, K. (1931). *Die psychologische Situation bei Lohn und Strafe* [Psychological conditions during reward and punishment]. Leipzig, Germany: Hirzel.
- Locke, E. A., & Latham, G. P. (1990). A theory of goal setting and task performance. Englewood Cliffs, NJ: Prentice Hall.
- McClelland, D. C. (1973). The two faces of power. In D. C. McClelland & R. S. Steele (Eds.), *Human motivation: A book of readings* (pp. 300–316). Morristown, NJ: General Learning Press.
- McClelland, D. C. (1987). Biological aspects of human motivation. In F. Halisch & J. Kuhl (Eds.), *Motivation*, *intention and volition* (pp. 11–19). Berlin, Germany: Springer.
- McClelland, D. C., Koestner, R., & Weinberger, J. (1989). How do self-attributed motives and implicit motives differ? *Psychological Review*, 96(4), 690–702.
- Muraven, M., & Baumeister, R. F. (2000). Self-regulation and depletion of limited resources: Does self-control resemble a muscle? *Psychological Bulletin*, *126*(2), 247–259.
- Murray, H. A. (1943). *Thematic apperceptive test manual*. Cambridge, MA: Harvard University Press.
- Rheinberg, F. (1989). *Zweck und Tätigkeit* [Purpose and activity]. Göttingen, Germany: Hogrefe.
- Rheinberg, F. (2006). Intrinsische Motivation und Flowerleben [Intrinsic motivation and flow]. In J. Heckhausen & H. Heckhausen (Eds.), *Motivation und handeln* (pp. 331–354). Berlin, Germany: Springer.
- Schultheiss, O. C., & Brunstein, J. C. (1999). Goal imagery: Bridging the gap between implicit motives and explicit goals. *Journal of Personality*, 67(1), 1–38.
- Sosik, J. J., Kahai, S. S., & Avolio, B. J. (1999). Leadership style, anonymity, and creative behavioral group decision making support systems: The mediating role of optimal flow. *Journal of Creative Behavior*, 33(4), 227–256.
- Strange, J. M., & Mumford, M. D. (2002). The origins of vision: Charismatic versus ideological leadership. *The Leadership Quarterly*, *13*(4), 343–377.

CROSS-REFERENCES

Aging and Work Motivation (66)

Motivating Individuals and Groups at Work in the 21st Century (68) Intrinsic Motivation in Public Organizations (69)

Organizational Politics in Management Settings

HUNTER L. HARRIS

Vanderbilt University

Political behavior is a phenomenon that has been present across interpersonal, group, and organizational settings for hundreds, if not thousands, of years. In fact, Aristotle argued centuries ago that man is an inherently political animal, and few have challenged that notion since. This phenomenon has become an increasingly important issue for business practitioners to understand and manage due to the changing organizational dynamics affecting today's workforce.

As managers become increasingly aware of the highly elastic nature of their organization's investment in human capital, they realize how many important intangibles come into play and must bring newfound attention to these factors. Organizational politics is a significant factor that has a profound impact on the effectiveness of the workforce. Managers will need to know what factors are primary drivers in creating a consistently effective environment and minimizing negative political behaviors, thus predisposing their organizational members to achieve their maximum potential.

This chapter will discuss views on how politics and political behavior are defined, the life cycle of their complex dynamics in and across the organization, and how they can best be understood and managed in the workplace of the 21st century. Politics will be explored across macro and micro levels of analysis and will reflect the different primary streams of research. The topic will be investigated from different fields of research such as social psychology and sociology as well as from different points of view within and across disciplines. This perspective will illustrate the evolution of this field that has come from a diverse

background to a multidisciplinary approach that is gaining momentum. Although politics will be explored from these different points of view, the driving focus will be how practitioners can identify, understand, and manage organizational politics and thus use it as a source of sustained competitive advantage. This advantage comes via mitigating negative politics in such a way that it enhances organizational effectiveness and reduces wasteful practices. The levels of political activity within the organization that will be addressed include macroanalysis for organizationwide dynamics and microanalysis for interpersonal and intragroup dynamics. Causes, effects, and managing strategies of political behaviors will be discussed on micro and macro perspectives so that the phenomenon can be understood in whole and in manageable parts.

HISTORY OF ORGANIZATIONAL POLITICS RESEARCH

An important first step is to identify what is considered political behavior and what are considered the different categories of political behavior. Although it has been commonly known to exist for centuries, the scientific study of organizational politics has only really begun to take shape in the last thirty years. Block (1988) offered a reason for the lack of study by likening research of organizational politics to the issues of sex in the 1950s: Everyone knew it was going on, but no one wanted to talk about it. It is ever present in our lives, but getting reliable information about it is next to impossible.

Groundwork for the study of politics has primarily occurred in the areas of sociology, social psychology, organizational behavior, and political science. The research from these areas often seemed to ignore the efforts of its counterparts in other fields leading to independent streams of research that often contradicted each other. More recent work has proven to be far more effective and compelling due to the use of a multidisciplinary approach. During the late 1970s and early 1980s, the first landmark works began to emerge that would set the stage for the modern study of organizational politics. A few of the most significant contributions to this field were offered by Mayes and Allen (1977), Bacharach and Lawler (1980), Mintzberg (1983, 1985), and Pfeffer (1981, 1992). These researchers helped to define what politics is and is not and to define the different types of political behavior. More recently, works by Ferris, Witt, Kacmar, Drory, and Vigoda-Gadot have made important contributions to the advancement of the study of organizational politics.

Bronston Mayes and Robert Allen (1977) made a distinction between political uses of power and influence tactics versus uses that were not deemed political. They offered a broad definition of politics: "Organizational politics is the management of influence to obtain ends not sanctioned by the organization or to obtain sanctioned ends though nonsanctioned influence means" (p. 675). This basic definition helps to define the first major division in the typology of political behavior in those actions. These include behaviors using organizationally approved (OA) tactics to achieve a non-OA objective and using non-OA tactics to achieve OA objectives. The distinction is whether the means or the ends are incongruent with those of the organization in determining the presence and type of political behavior. They propose that political behavior occurs when power or influence tactics are used that include the use of means or ends that are not organizationally approved, leaving other uses of power and influence apolitical in nature.

Samuel Bacharach and Edward Lawler (1980) offered a more in-depth look at the state of the discipline and the history behind it in their book, Power and Politics in Organizations. They reviewed the research that has occurred in the related fields of sociology, social psychology, and political science, and discussed how these different streams of research developed independently of one another, often ignoring or dismissing the offerings of the others. The use of power and influence through political means in the workplace is also discussed in depth. Their book offers the first compilation of related research used for the examination of the phenomenon in management settings and, thus, helped to create a foundation for a more singular stream of research. Many separate streams still exist today, but they are less disjunctive from each other as had previously been the case prior to this work.

The work of Henry Mintzberg (1983,1985) in the early 1980s brought about the most robust typology of the time, and many consider it one of the best even to this day. He

shared an overall viewpoint of organizations as political arenas in which varying levels of conflict and political behavior exist. Political behavior is presented as having a life cycle including an impetus or catalyst, development stage, resolution stage, and often a resurgence of conflict stage. Mintzberg defined and explained the multiple forms of strategies and behaviors classified as political in nature. This will be discussed in depth in the tactics and strategies section later in this chapter.

Gerald Ferris has offered many contributions to the field as one of the few scholars that has made the study of organizational politics research a primary stream of research across his distinguished career. One of the most important themes that Ferris, along with Micki Kacmar (1992), introduced was the importance of perceptions to the study and understanding of politics. They have investigated linking perceptions of politics to work outcomes, which has become another important contribution discussed in the next section.

Eran Vigoda-Gadot (2003) has offered some of the most recent compilation volumes that have helped to establish a solid foundation from which to direct future inquiry and are highly suggested resources for those new to or wishing to explore deeper into the field of organizational politics research.

Perceptions of Politics

As researchers seek a deeper understanding of the causes and effects of political behaviors, a new variable has emerged as an important factor in both causes and effects. This new variable is the study of organizational members' perception of politics within the organization. This is unique from previous efforts as it investigates employees' subjective perceptions, behaviors, and environments as political in nature. Multiple studies investigating this aspect of political research have shown that certain factors can create a significant variance between individuals' perceptions of politics. Such factors proven to have a strong correlation to an individual's perception of organizational politics include organizational influences, job/work environment influences, and personal influences (Ferris & Kacmar, 1992). Organizational influences are structural characteristics such as centralization of authority, formalization of rules and procedures, the hierarchical level within the organization, and the span of control of managers. Perceptions of politics increase when leadership of an organization is more centralized, span of control is larger, and when formalization of rules and is low. Different studies have shown conflicting effects regarding level of hierarchy within the organization. At higher levels within an organization, job and work environmental influences such as job autonomy, job variety, and feedback are all shown to reduce perceptions of politics. When ambiguity and uncertainty are high and sense of control over situational factors is low, perceptions of politics are much higher. The last category, personal influences, is a combination of demographic and individual characteristics such as personality and disposition. Certain demographics such as women and older workers perceive higher levels of political behaviors (Ferris, Russ, & Fandt, 1989). Certain personality types such as Machiavellian and self-monitoring types are more likely to perceive high levels of politics as well.

These different levels of influence and the factors within each combine to shape individuals' perceptions of the political nature of their work environment. Work outcomes directly associated with perceptions of organizational politics include job performance, job satisfaction, work anxiety, and organizational withdrawal.

Positive Versus Negative View of Politics

To varying degrees, the literature to date supports both positive and negative views of organizational politics. The preponderance of research, to date, has had a decidedly negative slant toward organizational politics; however, it is important to address the positive aspects, as politics cannot only harm your organization, but can also enhance it. Positive organizational politics can assist in helping individuals work through laborious bureaucratic processes that hinder efficiency. The use of politics can assist individuals who are in positions to offer positive contributions to the organization, but are not able to do so through established means. May (1972) argued that the use of organizational politics can assist the organization in resolving conflict and enhance its ability to adapt to a changing environment. He went on to say that political conflict creates a balance between those who have power and those who lack it. This balance, in turn, improves the organization's flexibility, reduces groupthink, often prevents stagnation, and may even promote growth and rejuvenation within the organization. Political avenues also allow an additional mechanism for members of the organization to promote a variety of organizational objectives that would otherwise be unattainable.

Negative politics, also called corrosive politics, refers to political behaviors that are self-serving in nature, but result in a negative net outcome for other organizational members or the organization itself. The negative outcome can come about as a direct result of a specific political behavior, as an indirect result of many political behaviors in aggregate, or as the eventual latent outcomes of either. Corrosive politics is often described as deceptive, ingratiating, manipulative, subversive, and irrational and often represents the achievement of goals with means that are considered immoral or unethical. Individuals may create or otherwise allow a negative event such as a crisis to occur in order to eventually solve the problem and appear as having "saved the day." Organizational effects that are known to be caused by corrosive politics include increased stress and pressure at work; perceived unfairness in the evaluation of employee performance; perceived unfairness in practices for rewarding performance and advancement opportunities; and reduced

organizational commitment and negative attitudes toward coworkers, supervisors, and the organization as a whole.

Corrosive politics often creates an attitude and resulting behavior of zero-sum thinking between and across groups. Zero-sum thinking is the idea that there must be a winner and a loser with corresponding absolute victory or absolute defeat. The common expression "kill or be killed" is an accurate description of this type of mentality. When zero-sum thinking is adopted as a framework for decision making and behavior, group and organizational cohesiveness and cooperation deteriorate. This, in turn, causes ineffective communication, decreases efficiency, creates incongruity between individual and organizational objectives, and often results in the mismanagement of resources and information. When compared to their peers, organizations consumed with negative political behaviors are known to consume massive amounts of energy and resources because of the disruptive influence of corrosive political behaviors. This chapter will more closely examine corrosive politics, as the applications for management are more pertinent for creating strategies that mitigate and effectively manage the disruptive nature of corrosive politics.

POLITICAL TACTICS AND STRATEGIES

Although the impetus for political behavior within an organization can stem from multiple catalysts, the tactics of political action have been classified into identifiable categories. Henry Mintzberg (1985), as well as David Kipnis and Ian Schmidt (1980), laid down the foundations for these major categories in the early 1980s. Mintzberg laid out his tactics as a group of "games" to be played across what he called the political arena. His categories would define the political game, the main players of the game, the reasons why the tactics were used, and how the tactic related to other systems of power and influence throughout the organization.

The following is a summary of his 13 tactics:

- 1. Insurgency—This tactic is typically used by individuals in lower levels of the organization to resist formal authority and legitimate power, either individually or in small groups.
- Counterinsurgency—Managers and senior managers will use their legitimate or formal authority to counteract lower level attempts at insurgency.
- 3. Sponsorship—This tactic is used by individuals of lower rank within the organization who seek to align themselves with higher ranking individuals by offering their loyalty in return for the status of an alliance with this higher ranking individual. In doing so, the higher power individual gets a loyal follower and the lower ranking individual gains an ally with more legitimate power than he or she could acquire on his or her own.

- 4. Alliance building—Individuals will attempt to form a quid pro quo relationship with their peers. A participant will offer his or her support to the participant's agendas in exchange for support of his or her own agendas in return.
- 5. Empire building—Middle and higher ranking managers and players within an organization will seek the support and loyalty of key, lower ranking contributors in exchange for the status of an alliance with a high-ranking position. This is very similar to the sponsorship game simply viewed from the reverse perspective.
- Budgeting game—Rival players compete for financial resources in order to advance their particular agendas. Efforts to acquire the financial resources often indirectly relate to their stated objectives and are sought more for power and discretionary use.
- 7. Expertise game—This tactic involves either the use or with-holding of information for personal gain. An individual can create an advantage for himself or herself by exploiting technical skills and knowledge or by withholding critical knowledge, skills, or information in such a way that it puts competitors at a disadvantage.
- 8. Lording game—This tactic involves the brandishing of formal and legitimate power of different types over those who have less of it. In this way, the individual can create a larger perceived power distance in the relationship and, thus, create the perception among others that his or her legitimate power is greater than it actually is.
- 9. Line versus staff game—This game is similar to the lording game, pitting technical experts from the staff ranks, who try to leverage their expertise as a form of power, against the line managers, who attempt to leverage their legitimate power over the staffers.
- 10. Rival camps—This is, perhaps, the most divisive and corrosive among the political tactics, as it creates a zero-sum game between rival coalitions. When two coalitions created through alliance or empire building find that their agendas are in competition with one another, they will use divisive and illegitimate tactics to undermine the efforts of the other coalition while ensuring the success of their own. This reflects the classic "kill or be killed" scenario that is played and will escalate until a victor emerges.
- 11. Strategic candidates—Managers at mid- and high levels of the organization use their ability to hire, promote, or appoint individuals into strategic positions that will ultimately return the favor by using their new positions to help the mangers achieve their own objectives.
- 12. Whistle-blowing—This event occurs somewhat rarely, as the actor can typically only use the strategy once. An individual will have privileged information, especially as to disclose immoral or illegal behaviors by the organization, which they will leverage to reach a specific objective in exchange for silence.

13. Young Turks—This is a high-stakes strategy that involves questioning the legitimate power of the organization or that of individuals in the highest levels of leadership. Younger and ambitious power players within the organization will question whether the "old guard" still has the correct strategy and ability to effectively govern the organization.

Kipnis, Schmidt, and Wilkinson (1980) investigated 370 influence tactics that they had broken down into 14 categories. After multiple empirical studies, they elected to narrow the list to eight dimensions of influence that the data suggested provided the most impact. They asserted that these categorizations cover the most predominant and most effective political tactics and form the basis for their typology. Their eight dimensions of influence include assertiveness, ingratiation, rationality, sanctions, exchange, upward appeals, blocking, and coalitions. Most of these factors are similar to or can be seen in the Mintzberg items and thus will not be discussed in depth in this chapter.

Additional researchers have focused on other factors with which to categorize political actions, such as the direction of influence (vertical or lateral), the legitimacy of the tactic, whether the behavior is viewed as strategic or tactical, and if the behavior is defensive or offensive in nature. Overlap and differences in opinion can be seen through these different perspectives, and a resolution in the form of a universally agreed upon typology has not yet been reached even in current research.

MACRO CAUSES OF POLITICAL BEHAVIOR

Macro politics is defined as taking place at the organizational level and interorganizational level. This is distinct from micro politics which takes place at the interpersonal and group levels of the organization. Three characteristics that are commonly discussed when seeking to understand the nature of politics at a macro level include intensity, pervasiveness, and duration (or stability). *Intensity* refers to the magnitude of the political actions being undertaken. *Pervasiveness* refers to how widespread the political behaviors are throughout the organization. *Duration* or *stability* refers to how long the political actions have been taking place or will take place, how lasting the effects will be, and to what degree the political behaviors destabilize the organization.

Mintzberg (1985) offers a few characteristics regarding the nature of politics within an organization and offers four major forms of organizations consumed by political behavior that he refers to as political arenas. The following discussion explores how the characteristics discussed above interrelate with each other to determine the dynamics of political action within an organization. The conflict that eventually gives rise to widespread political behavior initially tends to be confined. From an organizational perspective, two primary groups seek to influence each other: the internal coalition and the external coalition. Both of these

groups are stakeholders, but they are divided by their ability to influence the outcome. The internal coalition is the group that has the most direct control of outcomes, including those with legitimate power or the means to exercise some form of control over the outcome of events. The external coalition includes stakeholders who wish to have influence over the outcome but lack the legitimate or formal means to do so and, thus, seek to influence the internal coalition in order to accomplish their aims. The resulting dynamic brought about by the interaction of these two coalitions triggers an escalation that results in Mintzberg's second premise that political conflict tends to eventually pervade the entire power system of an organization. As the external coalition seeks to use influence tactics to impose its conflicting demands on the insiders, the exchanges become increasingly political across and within both groups. This will tend to an increasingly politicized internal organization as the conflicting interests and tactics of the external coalition continue to escalate in intensity, pervasiveness, and duration. That said, another important premise says that few organizations can sustain a state of intense political conflict. This is because intense conflict consumes so much energy and so many resources from the organization that intense political conflict will eventually threaten all but the most protected of organizations. This point brings into focus the fact that if two or more of the characteristics such as intensity and duration are high, the organization and its members are at greater risk. As long as two of the three characteristics occur in moderation, the organization can frequently endure the political behavior. For example, in order for duration of political conflict to sustain itself in an environment, it must be moderated in its intensity and pervasiveness. In fact, moderate levels of political conflict can endure within an organization as long as the three characteristics are moderated against each other and, thus, the conflict is somewhat contained.

MICRO CAUSES OF POLITICAL BEHAVIOR

Micro politics is defined as taking place at the interpersonal and group levels. This is distinct from macro politics, which occurs at the organizational and interorganizational levels. The causes of corrosive micropolitical behavior are divided into two major categories: political behaviors that are intentional, deliberate, and often premeditated, and political behaviors that are initially unintentional and brought on by basic self-preservation needs. Many factors can motivate individuals to maliciously use corrosive political behaviors as means to achieve their aims. Dispositional characteristics such as perceptions of morality can predispose individuals to evaluate alternative mechanisms to achieve their goals, such as corrosive politics. When individuals perceive that the environment in which they are operating is already highly political or that the organization condones political behavior, they will also strongly consider the use of political behaviors. Other factors that have a strong influence on political behaviors include job autonomy, input into decision making, job satisfaction, occupational status and prestige, employee relations, perceived control of one's own circumstances, and understanding of what and why events take place in an environment (Ferris & Kacmar, 1992). Several commonalities emerge across these factors, including increases in ambiguity, uncertainty, and lack of perceived personal control in an organizational environment, all of which are known to increase the prevalence of political behaviors. These factors, along with how to best manage them, will be discussed in depth later in the chapter in the mitigation of political behavior section.

Individuals unable to obtain their goals through traditional means will tend to look for alternative methods to achieve their intended goals. This will oftentimes include the use of behaviors and tactics that are political in nature. The behaviors tend to perpetuate themselves as others within the organizational environment become aware of this political behavior and, in turn, become more likely to use such tactics to achieve their own means; thus, the pattern plays itself forward.

The logic of why people act politically in organizations seems fairly straightforward when such political actions are used to promote self interests or accomplish an organizational strategy without negatively effecting others. Why people of good moral conscience would act in a seemingly unethical way that is out of alignment with the best interest of the group and the organization is a more difficult question to resolve. Certainly many people actively seek out opportunities to leverage political behaviors to advance their personal agendas and careers. But what would cause someone to act politically or use political tactics without premeditation and even without conscious intent? The answer lies in understanding how people assess their environment and how they feel they must respond in order to thrive, or even survive, in that environment. Current research on this issue would seem to point to the idea that motivations for malicious political behavior, whether premeditated or not, seem to stem from how people define who is working toward their common interests versus who is working against these interests. A major component of how people make such a determination includes a pair of important streams of research in social psychology called social identity theory and self-categorization theory.

Social Identity and Self-Categorization Theories

Established and more frequently utilized by social psychologists outside the United States, *social identity theory* refers to how individuals make sense of themselves and how their cognitive functions change as a function of social or environmental context and perceived group memberships (Tajfel & Turner, 1985). A person's self-image and behavioral choices change when different group memberships are salient to her or him, also called one's "social identity."

Positive bias will be shown to other members of the group to which the individual perceives he or she belongs, also called one's "in-group." An unfavorable bias will be shown to individuals that are perceived as not being part of the group, also called the "out-group." This phenomenon is called "in-group bias" and helps to explain why malicious political behavior is less likely between members of the same in-group while out-group members are far more likely to be the target of political behaviors.

Self-categorization theory discusses the process of how individuals establish the boundaries of their in-groups. Evervone has many different potential social identities that can become salient to them as a result of contextual factors such as environmental, social, cultural, and threat assessment. People will typically categorize themselves into the social identity that they believe will bring them the most value in a given situation. This process can occur due to conscious factors such as perceived commonalities with others, mutual goals, and perceived mutual threat. In the case of threat assessment, the higher the level of threat the individual perceives, the smaller the individual's in-group will typically become to the point that she or he is an in-group of one. In addition to a shrinking in-group size, self-categorization also occurs in the form of levels of satisfied needs, from basic needs such as survival to more advanced needs like friendship and achievement. If more basic needs are not met, such as factors influencing survival, individuals will be motivated to meet those needs before they seek to fulfill more advanced needs. In this way, the size of the in-group and level of satisfied needs will motivate individuals to act for the benefit of the group or for the benefit of themselves. The next section discusses the concept of self-categorization based on threat assessment in more depth, including how it influences political behaviors.

Threat Assessment as Catalyst for Political Behavior

Our understanding of instinctive threat assessment brought about by perceptions of environmental factors has foundations in the work of researchers in the social sciences including Maslow, Alderfer, McClelland, McGregor, and Herzberg. Collectively, these researchers have helped to create a framework for understanding the relationship between levels of self-categorization based upon perception of environmental factors. As previously discussed, self-categorization is the way in which we define ourselves as a function of our environmental context. Self-categorization helps us to understand the boundaries of what group we perceive as most salient in a given context and serves to establish what group size will satisfy our needs at the required level. When a specific level is most salient, its corresponding needs will motivate an individual's behavior, whether consciously or unconsciously.

Maslow's (1943) hierarchy of needs is, perhaps, the most commonly known framework for discussing what level of self-categorization is most salient as it applies to our response to environmental factors, especially as it applies to self-preservation. Maslow discusses five levels of categorization that motivate our personal behavior based upon what levels of needs are being met. More basic needs such as survival must be satisfied before an individual will seek to satisfy higher level needs. For example, basic human needs such as food, water, and shelter are the most primary needs that must be met before any others are considered. Once these basic survival needs are met, other factors such as personal safety, relationships, and self-esteem can be pursued in order of most basic need to higher level need. That is to say, we pursue the things that we must have before we can pursue the things we want to have.

In the case of organizational politics, the level of threat an individual feels from others or from the organization itself will dictate the level of self-categorization that will motivate the behaviors. As the organizations and its members become increasingly political, perceptions of fair play and job security significantly decline. As a result, an individual's threat assessment will be high, therefore reducing one's unsatisfied needs to the most basic levels. As these needs revert to the lowest levels, an individual's perceptions of in-group also reduce from organizational to a group of only oneself.

In modern times, the basic needs of food, water, and shelter are primarily made available through the financial currencies gained from employment. When the security of that flow of income is threatened due to fear of losing employment, it reduces individuals' unfulfilled needs to the most basic levels. They will use whatever means necessary, including corrosive political tactics, in order to achieve the satisfaction of their most basic needs such as job or financial security, which enable them to provide the most basic needs for themselves and their family.

If management is able to create an environment where job security is not constantly in jeopardy, more basic needs will be satisfied, allowing employees to act out of motivations that are based on more advanced needs such as affiliation and self-actualization. Managing the work environment to mitigate politics will be discussed in more detail later in the chapter.

MITIGATION OF CORROSIVE POLITICAL BEHAVIOR

In recent years, management teams have struggled with the increasingly important challenge of finding a strategy to maximize the effectiveness of their human capital while minimizing overhead. The dynamic nature of human interaction in both micro and macro settings presents a formidable challenge for both researchers and practitioners. The element of political behavior that can seem most ambiguous in this complex environment is also one of the most impactful to the success of people, teams, and even the organization as a whole. Having established the negative implications of corrosive politics within organizations, the

focus will shift to a discussion of proactive management strategies that can be utilized to mitigate the negative influence of politics.

There are many emerging theories on ways to mitigate corrosive organizational politics. The primary themes involve the use of various types of perception management techniques with the end goal of reducing the environmental factors known to increase political activity. These techniques create the following perceptions for the employees: (a) alignment of goals between employees and organization, (b) reducing uncertainty and ambiguity, (c) increasing perceptions of fairness, (d) reduced threat assessment and increased job security, and (e) alignment of rewards structure so as not to condone political behaviors.

Alignment of Goals

Laurence Witt (1998) has recently explored a method for mitigating the use of corrosive political behavior. In his study, he assesses the relationship between perceptions of politics, organizational commitment, and job performance as a function of employee and supervisor goal congruence. The results show that there is indeed a negative job performance and organizational commitment impact when perceptions of politics are increased. The study also shows that employee understanding of organizational factors that influence employees' sense of control over a situation reduces the impact of politics on job performance. When employees sense that their goals are congruent with those of their supervisor and of the organization, a sense of in-group is formed. This in-group is created because its members have a common objective and a shared understanding of that common objective. Their individual efforts will seek to advance the common agenda and, thus, the members will not attempt to undermine each other through political or other means.

Goal alignment has proven to be an effective mitigating factor of political activity when such political activity is conscious to the individual, for example, political behavior that is intentional and premeditated. Goal alignment will assist in the creation of a safer environment but, ultimately, only the employees' perception of their own safety within the environment will reduce the probability that they will utilize political behaviors to achieve the satisfaction of their most basic needs.

Uncertainty and Ambiguity

Uncertainty and ambiguity are both factors known to increase political activity within organizations. Uncertainty refers to lack of information or unclear information regarding what individuals perceive to be factors directly related to their success or failure. Lack of information is commonly known to be a cause of fear within many people, especially as it applies to their livelihoods. As this becomes increasingly worrisome, it will increase their likelihood of using political behaviors as a way to offset their lack of informa-

tion in striving for successful outcomes in their jobs. In the absence of information, people typically try to fill these voids with educated guesses that are negatively biased, as people tend to fear the worst. Increased uncertainty will frequently have the same effect on employees as increased fear.

Ambiguity is very similar to uncertainty but rather than simply the absence of information, it is more specific about what information is unclear in the organizational environment. Whereas uncertainty is a general lack of information regarding circumstances of the overall environment, ambiguity is the lack of specific information about organizational characteristics such as chain of command, specific operating procedures, policies, and overall knowledge of means and ends that the organizations anctions. In organizational environments where sanctioned means and ends are not highly formalized and strictly enforced, employees will often fill this information vacuum with their own interpretation of means and ends to be pursued that will obviously be biased in a self-serving way.

The solution to these exacerbating factors is increasing the flow of accurate and pertinent information to the employees, reducing both uncertainty and ambiguity. This flow of information will help in two important ways: It will reduce their fears brought on by what they do not know and allow them to use correct information to hone their efforts on what is most appropriate. Sharing pertinent information with employees in a timely manner allows them to focus on what is actually happening rather than expend energy focusing their concerns on what they fear might be happening. This will also enable the organization to realize a more sustainable goal alignment with their employees, who will better understand the organization's challenges and opportunities. Organizationally sanctioned means and ends should be highly formalized and rigorously and consistently enforced. Having explicitly stated policies, rules, and procedures that are consistently enforced helps to enhance employee perceptions of fairness, which is another important factor in managing political behavior.

Perceptions of Fairness

Perceptions of fairness within the organization also strongly correlate to political behavior. Classical social psychology discusses expectancy theory and equity theory as methods in which people will measure their responses to stimuli depending on their perceptions of fairness in a given situation or environment. *Expectancy theory*, as pioneered by Kurt Lewin (1936), is based on the idea that individuals will respond to their perceptions of reality rather than reality per se. Individuals' expectations of an outcome may bias their perceptions of what actually does occur, thus changing how they view the event and its outcome and how they choose to respond to it. If individuals perceive that political behaviors are an accepted practice and even receive rewards in their environment, it will influence how they evaluate the use of politics themselves. This will often greatly increase

the chances that individuals who would not normally consider political actions will use them due to their perception that they are a normal and rewarded practice.

Equity theory occurs when individuals perceive that an event or its outcome has occurred unfairly and, as a result, they will be more likely to act in a way that would give them an unfair advantage, thus "leveling the playing field." They will then feel that the outcome was fair, as the net outcome of both unfair actions resulted in equal fairness for both parties involved. This will quickly lead to a tit-fortat battle that can spread from an interpersonal exchange to a "pass it forward" organizational epidemic. Eventually, such illegitimate, and even immoral, behaviors will be perceived as acceptable practices to the organizational culture and cause it to become consumed by political strife. As discussed earlier in this chapter, this is something that is toxic, and even lethal, to an organization. The solution to this particular catalyst of political behavior is nearly the same as that for uncertainty and ambiguity. An appropriate flow of pertinent and timely information along with formalized organizational structure, procedures, and policies that are rigorously, consistently, and fairly enforced will create an environment with far less uncertainty that is far more likely to be perceived as fair, thus reducing the motivation for corrosive political choices.

Expanding In-Group Size

As discussed in the sections on social identity theory, self-categorization theory, and threat assessment, motivations for malicious political behavior, whether premeditated or not, seem to stem from how employees define who is working toward their common interests versus who is working against these same interests. This translates into how individuals define who belongs to their in-group. In the context of business, this group will often be based upon who has aligned goals and who can best help advance each other's agenda. Factors such as reducing uncertainty and ambiguity, increasing perceptions of fairness, and improving job security all contribute to a larger in-group as perceived by an individual. If managed correctly, the organization can create an environment where these factors lead to increased loyalty, affiliation, and perception of safety for the employees. When this occurs, individuals' basic needs are met and, thus, they are more likely to increase the size of their in-group to include their peers and even the organization as a whole. In-group status will significantly reduce the likelihood that individuals will utilize corrosive political behaviors against each other. Using the methods discussed here that leverage basic human psychology can reduce political behaviors that are both conscious and unconscious in nature.

Performance and Rewards Alignment

A final method for managing the prevalence of corrosive organization politics is through the correct application

of performance and rewards alignment practices. When outcomes are rewarded without any consideration to how they were obtained, methods that are not organizationally sanctioned are more likely to occur. Establishing rewards for performance on the basis of organizationally sanctioned objectives using organizational sanctioned methods will discourage the use of political behaviors within the organization.

MANAGEMENT OF POLITICS AS A COMPETITIVE ADVANTAGE

The three primary themes of human capital, social capital, and organizational capital will be used to discuss how the effective management of politics within the organizational environment can be a source of competitive advantage. *Human capital* refers to the value that an organization derives from the knowledge, experience, skills, abilities, and talents possessed and utilized by an organization's members. *Social capital* refers to the value that organizations derive from the ways in which their people interact, communicate, function in teams, help each other, share information, and relate to one another. *Organizational capital* includes the value an organization derives from its policies, procedures, structure, and processes.

As managers seek to better understand how these intangible constructs factor into their day-to-day management decisions, they must analyze the different ways to construct a strategy using these different forms of capital. The key in understanding how organizational politics positively or negatively impacts the business comes from understanding the mechanism in which it affects these different parts of the organization. In breaking down the cause-and-effect relationships, it is important to note that the factor most strongly influenced by political behavior is that of social capital. Although social capital is where the effects of organizational politics can be identified most directly, the downstream impact of negatively affected social capital has a profound disruptive influence on employees' ability to perform, thus reducing value that can be gained from human capital. Employees depend on a healthy work environment, including effective teamwork and communication, in order to maximize their contribution to the organization.

Organizational capital is one of the primary mechanisms used to mold and manage organizational politics. Appropriate processes, procedures, and culture can create an environment which will mitigate existing political behaviors and resist future political phenomena. That is to say, changes in organizational capital that mitigate corrosive political behaviors will reduce the disruptive influence of politics on social capital. The way an organization's policies, procedures, and environment dissuade the use of political behaviors will empower a much more effective employee interaction and create a healthier working environment. This will enable employees to have a high level of satisfaction and superior performance concurrently.

Using appropriate management strategies, as discussed in the management of politics section, will often reduce the potential use of corrosive political tactics. Mitigating corrosive political activity creates tremendous advantages for organizations in a way that is difficult to imitate. Few, if any, components of an organization escape the direct impact of corrosive political behavior. As a result, enacting proactive policies to effectively manage corrosive organizational politics throughout the organization can translate into solid financial returns with minimal associated risks or expenditures.

CONCLUSION

Although the existence of politics within organizations is nothing new, the search for a better understanding of how it impacts the workforce is certainly emerging as an important challenge for managers in the 21st century. This chapter has offered a guided journey though the dynamic and evolving field of organizational politics within management settings. The reader should leave with an understanding of how the knowledge of organizational politics has come to its current form; tactics and strategies used in the course of political behavior; causes for political behaviors including causes for nonmalicious behaviors; and finally, strategies for mitigating politics through effectively managing environmental factors that trigger political behaviors. Although creating an organization that is free of corrosive political behaviors is likely an unattainable goal, it is within management's reach to mitigate the conditions that allow such activity to thrive. Managers will need to know what factors are primary drivers in creating a consistently effective environment that mitigates negative political behaviors. Using this information to create and execute proactive strategies will allow an organization to create a healthier working environment, increase employee satisfaction, and achieve higher levels of performance from its workforce.

REFERENCES AND FURTHER READINGS

- Aristotle. (1962). *The politics*. Harmondsworth, UK: Penguin. Bacharach, S. B., & Lawler, E. J. (1980). *Power and politics in organizations*. San Francisco: Jossey-Bass.
- Block, P. (1988). The empowered manager: Positive political skills at work. San Francisco: Jossey-Bass.
- Ferris, G. R., Russ, G. S., & Fandt, P. M. (1989). Politics in organizations. In R. A. Giacalone & P. Rosenfeld (Eds.), *Impression management in the organization*. Hillsdale, NJ: Laurence Erlbaum.
- Ferris, G. R., & Kacmar, K. M. (1992). Perceptions of organizational politics. *Journal of Management*, 18(1), 93–116.
- Haslam, S. A. (2004) *Psychology in organizations: The social identity approach*, London: Sage.

- Hirschman, A. O. (1970). *Exit, voice and loyalty*. Cambridge, MA: Harvard University Press.
- Jackall, R. (1988). Moral aazes. Oxford, UK: Oxford University Press
- Kipnis, D., Schmidt, S. M., & Wilkinson, I. (1980). Intraorganizational influence tactics: Exploration in getting one's way. *Journal of Applied Psychology*, 65(4), 440–452.
- Lewin, K. (1936), *Principles of topological psychology*. New York: McGraw Hill.
- MacGregor Serven, L. B. (2002). The end of office politics as usual. New York: AMACOM.
- May, R. (1972). Power and innocence. New York: Norton.
- Maslow, A.H. (1943). A theory of motivation. *Psychological Review*, 50, 370–396.
- Mayes, B. T., & Allen, R. W. (1977). Toward a definition of organizational politics. *Academy of Management Review*, 2(4), 672–678.
- Mintzberg, H. (1983). *Power in and around organizations*. Englewood Cliffs, NJ: Prentice-Hall.
- Mintzberg, H. (1985). The organization as political arena. *Journal of Management Studies*, 22(2), 133–154.
- Neuhauser, P. (1988). *Tribal warfare in organizations*. Cambridge, MA: Harper & Row.
- Pfeffer, J. (1981). *Power in organizations*. Marshfield, MA: Pitman.
- Pfeffer, J. (1992). *Managing with power*. Boston: Harvard Business School Press.
- Reardon, K. (2000). *The secret handshake*. New York: Random House.
- Sennett, R. (1998). *The corrosion of character*. New York: W. W. Norton & Co.
- Tajfel, H., & Turner, J. (1985). The social identity theory of intergroup behavior. In S. Worchel & W. G. Austin (Eds.), *Psychology of intergroup relations* (2nd ed., pp. 7–24). Chicago: Nelson-Hall.
- Vigoda, E. (2003). *Developments in organizational politics*. Cheltenham, UK: Edward Elgar.
- Vigoda-Gadot, E., & Drory, A. (2006). *Handbook of organizational politics*. Cheltenham, UK: Edward Elgar.
- Witt, L. A. (1998). Enhancing organizational goal congruence: A solution to organizational politics. *Journal of Applied Psychology*, 83(4), 666–674.
- Yukl, G., & Tracey, I. B. (1992). Consequences of influence tactics used with subordinates, peers, and the boss. Journal of Applied Psychology, 77(4), 525–535.

CROSS-REFERENCES

Conflict Management in Work Teams (44)

Human Resources Management in the 21st Century (55)

Understanding and Managing Misbehavior in Organizations (72) Organizational Paranoia: Origins and Dysfunctional Consequences of Exaggerated Distrust and Suspicion in the Workplace (73)

Organization Development in the 21st Century (92)

Why Catastrophic Group or Organizational Failures Happen (96)

Understanding and Managing Misbehavior in Organizations

ELY WEITZ AND YOAV VARDI Tel Aviv University

It is quite safe to assume that most, if not all, members of work organizations, throughout their employment, engage in some form of misbehavior that is related to their jobs, albeit in varying degrees of frequency and intensity. Such misbehaviors appear to range the full spectrum from relatively minor to very serious, for example, workplace incivility; insulting behaviors; social undermining; theft of company assets; acts of destructiveness, vandalism, and sabotage; substance abuse; and misconduct perpetrated against fellow employees, toward the employer, or toward other organizations. Such acts of misbehavior are important organizational events and must be better understood (Fox & Spector, 2005; Griffin & O'Leary-Kelly, 2004; Kidwell & Martin, 2005; Vardi & Weitz, 2004).

Organizational misbehavior (OMB) comes with a hefty price tag attached to it. Just 10 years ago, estimates of the costs of the most prevalent misbehavior, employee theft, run as high as \$200 billion annually in the United States alone. Estimates of total costs resulting from problem drinking in the workplace were close to \$170 billion. Fortunately, with the awareness of costs comes a growing consciousness of OMB. As Trevino, Weaver, and Reynolds (2006) recently stated, "Stakeholders, including stockholders, communities, and governments, have placed increasing pressure on organizations to manage employees' behavior in ways that will reduce individuals' illegal and unethical conduct"

(p. 951). It is therefore incumbent upon managers to learn and know about such phenomena in their organizations, and to develop effective ways of properly managing them (see Ivancevich, Konopaske, & Matteson, 2005, chap. 8). In order to control such costs, leaders need to understand what motivates employees, as well as which factors in the work environment are conducive to such behaviors.

Over the last two decades, the prevalence of misbehaviors in the workplace has come to be coupled with a wide array of scholarly definitions and conceptualizations. They also come under a variety of terms denoting similar meaning, such as

- noncompliant behavior (Puffer, 1987);
- organizational misbehavior (Ackroyd & Thompson, 1999; Vardi & Wiener, 1996);
- workplace deviance (Robinson & Bennett, 1995);
- workplace aggression (Baron & Neuma,n 1996; O'Leary-Kelly, Griffin, & Glew, 1996);
- antisocial behavior (Giacalone & Greenberg, 1997);
- employee vice (Moberg, 1997);
- retaliatory behavior (Skarlicki & Folger, 1997); and
- counterproductive behavior (Sackett & Devore, 2001).

Considering workplace misbehavior as a form of deviance, Hollinger (1986) observed that sociological research on employee misbehavior centers around two foci: *production deviance* and *property deviance*. The first category includes various types of behavior that are counterproductive (e.g., substandard work, slowdowns, insubordination), and the second category pertains to acts against property and assets of the organization (e.g., theft, pilferage, embezzlement, vandalism).

A more comprehensive, empirically based typology of deviant workplace behavior was developed by Robinson and Bennett (1995). They conceived of employee deviance as voluntary behavior that violates significant organizational norms and that threatens the well-being of an organization, its members, or both. They offered a typology of "employee deviance" that consists of two dimensions: one running from personal to organizational targets, and the other from minor to serious infractions. Therefore, four types of voluntary and harmful misconduct emerge: (a) production deviance (e.g., wasting resources), (b) property deviance (e.g., stealing from company), (c) political deviance (e.g., showing undue favoritism), and (d) personal deviance (e.g., sexual harassment). Here, we expand on these typologies and offer a more comprehensive framework for learning about misbehavior in organizations.

The underlying question is, "Why do members of organizations engage in acts that constitute deviance from an acceptable mode of employee behavior?" Among scholars of management ethics, there is an ongoing debate as to whether the decision to misbehave (e.g., to make an unethical decision) is more a function of "bad apples" or of "bad barrels." That is, are misbehaviors a function of the personal characteristics of individuals (the "bad apples" perspective) or of organizational and societal variables (the "bad barrels" perspective)? For example, some argue that organizational psychopaths may be responsible for organizational misbehavior including accounting fraud, stock manipulation, unnecessarily high job losses, and corporately induced environmental damage (Boddy, 2006). Others argue that neither the individual nor the organizational and societal perspectives alone fully explain organizational misbehavior. Most, indeed, propose explanations that integrate both perspectives (e.g., Robinson & Bennett, 1995; Vardi & Weitz, 2004). That is, organizational misbehavior is a function of the person and of circumstances.

We propose that misbehavior in organizations should be viewed not only as pervasive but, as *intentional work-related behavior* that mostly (yet not necessarily) bears negative consequences for both individuals (perpetrators and targets) and the organization. OMB is an integral component of organizational reality and an important facet of individual, group, and organization conduct—not a marginal, negligent (i.e., deviant) organizational occurrence. We therefore adopt the Vardi and Wiener (1996) definition of organizational misbehavior (OMB) as "any intentional action by member/s of organization/s which defies and violates (a) shared organizational norms and expectations, and/or (b) core societal values, mores and standards of proper conduct" (p. 151). This excludes *un*intentional acts such

as accidental damage to a machine or injury to a coworker which, albeit significant and costly, are not committed with a conscious purpose to inflict damage.

BASIC TYPES OF OMB

An examination of a broad range of norm-violating behaviors in the workplace suggests that all such actions may be classified into three basic categories in terms of the underlying *intention* of the misbehaving individual:

- 1. Misbehaviors that are intended to benefit the self (*OMB Type S*): These are mostly internal to the organization and usually victimize the employing firm or its members. Such behaviors may have three categories of internal targets: (a) the work itself (e.g., distorting data); (b) the organization's property, resources, symbols, or regulations (e.g., stealing and selling manufacturing secrets); and (c) other members (e.g., harassing peers). An exception is a behavior by a member that appears to benefit the organization (e.g., overcharging customers), but is, in fact, intended to eventually benefit the individual (e.g., gaining a promotion).
- 2. Misbehaviors that are primarily intended to benefit the member's employing organization as a whole (*OMB Type O*): These (e.g., falsifying records or offering inducements in order to improve chances of obtaining a contract for the organization) are usually directed toward external victims such as other organizations, social institutions, public agencies, or customers. If the intention underlying this form of behavior is not primarily to benefit the organization, but is self-serving (e.g., for career considerations), it should not be classified as OMB Type O. More likely, this would be OMB Type S.
- 3. Misbehaviors that primarily intend to inflict damage and to be destructive (OMB Type D): Targets of these behaviors could be both internal and external. Whereas the intentions underlying Type S and Type O misbehaviors are to benefit either the individual or the organization, the intention underlying OMB Type D is to hurt others or the organization. Such intentional misbehaviors (e.g., sabotaging companyowned equipment) may be perpetrated by members either on their own volition (e.g., as a revenge or a response to perceived or actual mistreatment) or on behalf of significant others (e.g., interfering with organizational operations to comply with a union's expectations). However, the underlying intention must be to cause some type of damage. As a rule, when more than one intention seems to underlie an act of OMB, and when observations yield equivocal data, the predominant intention would determine the classification.

ANTECEDENTS OF OMB

Over the years, researchers have identified many antecedents contributing to property misconduct as feelings of injustice or exploitation, attempts to ease personal financial pressure, moral laxity, available opportunities, dissatisfaction with work, perceptions of pay inequity, feelings of frustration, and a desire to revenge. Vandalism, as property deviance, was also found to be associated with perceptions of inequity and mistreatment. Others have viewed misbehavior principally as retaliatory tactics against management mistreatment.

Our definition of OMB and the proposed conceptual framework, which emphasizes the distinction between normative and instrumental determinants of misbehavior, suggest the existence of identifiable antecedents that may affect the formation of the motivational components in the model. We believe that antecedents contributing to the instrumental component would primarily influence Type S misbehavior, and that antecedents contributing to the normative component would affect Type O misbehavior. Both forces may influence OMB Type D misbehavior. The antecedents are categorized according to the levels of analysis generally accepted by scholars of organizational behavior: *organization*, *group*, *task*, and *individual*.

Organization-Level Antecedents

Organizational Goals

Organizational goals—both implicit and declared targets that serve to translate organization strategy to actual plans, closely reflecting top management values and expectations—are likely to strongly influence members' job performance and productivity levels. However, the pursuit of organizational goals may also encourage employee misbehavior, particularly when they are conflicting, highly demanding, vague, or unrealistic (Stein & Kanter, 1993) and are supported by a strong culture or by "neurotic" (Kets de Vries & Miller, 1984) executives. Ackroyd and Thompson (1999), for example, posited that employee misconduct is mostly a form of protest against arbitrary managerial control.

Control Systems

Control systems are physical or procedural entities within the workplace designed specifically to reduce the occurrence of events judged to be detrimental to the organization. Typically, they serve to increase the risk of detection, and thus, the likelihood that perpetrators of such acts will be sanctioned (Sackett & DeVore, 2001). It stands to reason that oppressive—as well as lax—controls, performance appraisal, rewards, disciplinary systems, and special monitoring arrangements may contribute to the emergence of OMB. Certain jobs and work organizations involve operations for which external control of employee behavior is inherently difficult. Home delivery, professional or food services, and operations in which cash transactions cannot be directly monitored by receipts and inventory counts are only a few examples of work processes that may, at times,

be difficult to monitor. Thus, control systems may have direct impact on members' instrumental considerations on whether to engage in, or refrain from, acts of misconduct: when confronted with extreme control (e.g., surveillance), employees might attempt to resist and protest through damaging behavior (OMB Type D); lax controls may, however, be perceived as a sign of trust and may lead to exemplary behavior. However, the very same signals may be viewed as a form of organizational weakness and may present a built-in opportunity to misbehave.

Organizational Culture and Climate

Organizational culture is widely regarded as a construct denoting the extent to which members share core organizational values (Wiener, 1988). Several writers have demonstrated the power of culture as a tool used by certain dominant groups to shape members' values and to reduce deviance (Boye & Jones, 1997). Furthermore, the way employees perceive the fairness with which they are treated and the perceived equity of the distribution of resources are important antecedents of misbehavior. Thus, ethical organizational policies and practices (ethical climate) clearly influence the ways in which employees behave and misbehave (e.g., Vardi, 2001).

Organizational Cohesiveness

Cohesiveness is the degree of social bonding and normative closeness. In very cohesive work environments, the pressures to adhere to norms of work conduct are especially high. Cohesiveness, therefore, may affect misbehavior in a manner similar to the way that organizational culture effects OMB (Vardi & Wiener, 1996). Indeed, it may be more powerful. We regard this organization characteristic as a significant antecedent that may strongly contribute to wrongdoing in the name of ideology and organizational causes (OMB Type O). It may also facilitate and encourage widespread "prosocial" rule breaking in the organization (Morrison, 2006).

Group-Level Antecedents

As Goffman (1971) so vividly demonstrated, the self exists only in relation to others. In the workplace, the workgroup is indeed a very significant other. Griffin, O'Leary-Kelly, & Colins (1998) emphasized the importance of groups in terms of both the causes and the consequences of what they call "dysfunctional behavior" in organizations.

Internal Pressures

Ever since the role of work group affiliation was demonstrated to be a major determinant of work behavior, groups have captured significant research attention. Studies on groups and their effects within the organizational setting

have exposed both positive (productivity) and negative (restriction) effects. Most theorists and researchers posit that workgroups bear a positive influence on individual work behavior by reinforcing normative performance and attitudes. Such influential social-psychological approaches as Bandura's (1973) social learning theory and Salancik and Pfeffer's (1978) social information processing theory attempt to explain why and how groups exercise (positive) power over their members. Social information processing theory would suggest that if one is a member of a workgroup in which misbehavior such as pilfering or false reporting goes unsanctioned, he or she is more likely to engage in such misbehavior as well.

External Pressures

Interest in group behavior in organizations has received significant boost from contingency, charismatic and transformational, and team leadership theories (Avolio, 1999). These approaches, however, tend to emphasize the role of the manager-leader in influencing subordinate (individual and group) normative behavior. But leaders may encourage both positive and negative attitudes and behaviors. Greenberg (1997) explicated the role of groups in enhancing not only prosocial, but also antisocial (e.g., stealing), work behavior. Robinson and O'Leary-Kelly (1998) found that the group's antisocial behavior may actually serve as a model for individual members' work related OMB (e.g., damaging employer property, purposely hurting a colleague, deliberately breaking rules).

Task-Level Antecedents

Job Design

Most jobs are designed so that they include some built-in opportunity to take advantage of or misuse various organizational resources (e.g., time, office equipment, work tools, telephone and mail, Internet, etc.). In many cases, the degree to which such built-in opportunities exist may enter into the instrumental calculations by the employee concerning the benefits, consequences, and risks of capitalizing on such opportunities. Some work organizations apply stringent mechanisms to determine what their employees are doing at any given moment, while others employ lax systems or none at all. It is clear that these may affect employee behavior and misbehavior in the workplace. Vardi and Weitz (2001) reported results of a field study in which job autonomy was a significant predictor of misbehavior.

Individual-Level Antecedents

Personality

Two personality variables in particular seem to affect motivational components and, in turn, the intention to engage in OMB: the level of moral development and the degree of sociopathic predisposition—the state characterized by disregard for social norms and obligations without the inhibiting experience of guilt and remorse—of an organization member. Of course, extreme degrees of sociopathy characterize only a marginal portion of any legitimate organization's workforce.

Significant relationships between certain personality traits and workplace delinquency were reported by Ashton (1998). Trevino (1986) proposed the usefulness of such traits as locus of control and field dependence in predicting unethical decision-making behavior among managers. Griffin et al. (1998), too, included individual ethics, values, and morality as antecedents of dysfunctional work behavior. Fox and Spector (1999) also found that personality traits affect misbehavior and reported that significant relationships exist between irascibility, anxiety, impulsiveness, and organizational misbehavior. In addition, it is common knowledge that in extreme cases, sociopathic predispositions or pathological tendencies of organizational members are important antecedents of such conduct. Hence, undoubtedly, personality plays a role in determining whether a worker will misbehave.

Attitudes

When individuals perceive that they are being mistreated by their employing organizations, the valence of self-benefiting misbehavior may increase (Vardi & Wiener, 1996). Researchers such as Greenberg (1990) discovered that such feelings may lead to employee theft. Hackett (1989) found a stable relationship between job dissatisfaction and absenteeism, and Klein, Leong, and Silva (1996) reported a relationship between workplace dissatisfaction and sabotage.

OMB MANIFESTATIONS

Following Vardi and Weitz's (2004) classification, we organize the expressions and manifestations of OMB in five broad categories: (a) *intrapersonal misbehavior* (e.g., workplace problem drinking, drug abuse, workaholic behavior), (b) *interpersonal misbehavior* (e.g., incivility, aggressive behavior, bullying, sexual harassment), (c) *production misbehavior* (e.g., rule breaking, loafing, absenteeism, tardiness), (d) *property misbehavior* (e.g., vandalism, theft, espionage, computer hacking), and (e) *political misbehavior* (e.g., misuse of power, impression management, politicking, favoritism).

Intraperson Manifestations

Substance Abuse

One of the critical manifestations of intrapersonal misbehavior in the workplace is substance abuse, or excessive use of substances such as alcohol, tobacco, and illegal drugs (Bacharach, Bamberger, & Sonnenstuhl, 2002; Mangione, Howland, & Lee, 1998). The use of drugs by workers is perceived to be a growing problem for the American labor force.

Workaholism

Individuals may choose to "abuse" themselves at work in other ways as well. They may, for example, exaggerate the role work plays in their lives. Some, for a variety of reasons, become increasingly devoted to their jobs, to their work, and to their careers. Such overcommitment and overinvolvement has been dubbed "workaholism" to denote a form of addictive behavior (e.g., Peiperl & Jones, 2001).

Interpersonal Manifestations

Incivility

We begin with what Andersson and Pearson (1999) so aptly call "workplace incivility." We find it necessary to stress that even miniscule expressions of impoliteness or rudeness may spiral into increasingly aggressive behaviors. One of the most common forms of workplace incivility is, without doubt, insulting behavior. Gabriel (1998), who charted different forms of insulting behavior such as exclusion, stereotyping, ingratitude, scapegoating, rudeness, and being ignored or being kept waiting, offered a unique insight into the social psychology of insults in organizations. To Gabriel, insults are intended to be *slighting*, *humiliating*, or offensive. Cynicism, another form of disparagement, is becoming an inherent characteristic of as much as 43% of the American workforce (Kanter & Mirvis, 1989). We treat cynicism as OMB because organizational members are expected to take their work environment seriously and act responsibly.

Revenge

Retribution and revenge are retaliatory behaviors well documented in human history ("eye for an eye") and are, not surprisingly, prevalent in organizational behavior (e.g., Skarlicki & Folger, 1997). McLean Parks (1997) has written extensively about the "art and science" of revenge in organizations. She has explored retribution both from the perspective of internal justice, as well as the reciprocity norms on which assessments of organizational justice and injustice are based. Her focus is on a type of reciprocal behavior that is relatively neglected: retributive justice, a form of justice available to those in organizations who feel mistreated, but are relatively less powerful. Perpetrators of workplace violence often see themselves as victims of injustice in the workplace. We view such conduct primarily as OMB Type D.

Hostility, Aggression, Bullying, and Violence

Cumulative survey data clearly demonstrate how prevalent violence in the workplace is. For example, in 1993 about 480 managers were surveyed about violence in their companies by Society for Human Resource Management (SHRM). Seventy-five percent reported fistfights, 17% reported shooting, 7.5% stabbing, and 6.5% sexual assault. A year later, the American Management Association (AMA), found that of the 500 general managers surveyed about 10% reported fistfights and assault with weapons, and about 1% reported workplace rape. The 1996 SHRM survey shows that 48% respondents reported violent incidents in their companies as compared to 57% in the 1999 survey. Incidents of work-related homicides frequent the media citing emotional upheaval, stress, drugs, and layoffs as just a few of the factors which trigger such crisis events (Mantell, 1994).

Sexual Harassment

Flirting, bantering, and sexual attraction are commonplace in work organizations. Certainly, not all social exchanges which have a sexual flavor constitute harassment or assault. Cleveland, Stockdale, and Murphy (2000) differentiate between workplace romance and sexual harassment. Consensual relationships, defined as those reflecting positive and autonomous expressions of workers' attraction, are prevalent in the workplace. Sexual harassment, however, consists of unwelcome advances, requests for sexual favors, or physical conduct of a sexual nature. It is unfortunately a pervasive phenomenon in work organizations. According to Schneider, Swan, and Fitzgerald (1997), to cite just one credible source, close to 75% of female employees report that they have been the object of sexually harassing behaviors in their workplaces.

Withdrawal Behavior

Undoubtedly, the most prevalent production-related misbehavior is the physical as well as the psychological absence or withdrawal from work (e.g., Hackett, 1989). In human resource terms, we refer to these as dysfunctional lateness, absence, and turnover. Unjustified absence from work and excessive tardiness, if they are acts of defiance of organizational norms, regardless of their consequences, are indeed a form of production and work-process related OMB. Not only do such behaviors negatively affect individual performance, they affect coworkers' attitudes and work behaviors as well.

Social Loafing

Through a collective effort, teamwork may, indeed, ease the load and creatively enhance productivity. However, working in a team may also cause individual members to exert less effort than they may otherwise—social loafing (see Kidwell & Bennett, 1993). The survival and success of a team are greatly dependent on members' belief that their participation in it will be personally beneficial to them, more so than if they worked on their own. When this belief is lacking, the willingness of the team members to contribute their relative share (sometimes more than their share) to the success of the collective task, diminishes.

Whistle-Blowing

Typically, whistle-blowing is an act undertaken by an employee when he or she decides to inform internal or external authorities or members of the media about practices considered unacceptable in the workplace. We view this phenomenon as a case of intentional organizational misbehavior, because in many settings, it may constitute a violation of core norms of duty expected from members. It is, to many, a form of treason or betrayal. Two of the most prominent researchers and writers on whistle-blowing, Miceli and Near (1997), view it as antisocial organizational behavior—behavior that is intentionally performed by a member of an organization directed toward an individual, group, or organization that the actor interacts with, with the intention of causing harm. For whistle-blowing to qualify as antisocial behavior under this definition, it must be pursued with the intent of inflicting damage or harming others. This behavior, then, is consistent with OMB Type D (Vardi & Wiener, 1996), and it would also be regarded as an antisocial act of retaliation or revenge (Miceli & Near, 1997). Blowing the whistle on the organization, or on specific members (e.g., superiors), would be considered as OMB Type O if it is motivated by a strong sense of identification with organizational values and mission, and thus, by a genuine concern for its well being and success.

Political Behavior

Scholars of organizations have pursued different avenues in their exploration of the intricacies of political action within work organizations. For most, the emphasis has been on the ways individuals and groups acquire and use power and influence to obtain desired resources. Some of the tactics actors choose to use are indeed legitimate and part of the normative system. At times, however, these tactics may indeed be negative, manipulative, and exploitative in nature (Vigoda, 1997). We take the second approach and consider as OMB those behaviors that are self-serving and manipulative and not sanctioned by the organization. Such behavior has many potentially negative consequences, including conflict and disharmony that occur when elements in the organization are pitted against each other. When individuals resort to deceptive and manipulative political tactics that are in violation of organizational codes of acceptable conduct,

they clearly engage in acts of organizational misbehavior. Moreover, when their work environment becomes too politically oriented or politicized, it may inadvertently become an arena for various other manifestations of misconduct, such as social undermining and subversion, incivility and insult, betrayal, and revenge.

Property Manifestations

Conceptually, we regard acts such as theft, vandalism, and espionage as organizational misbehavior when the act violates core organizational and/or societal rules. Thus, if the company specifies that using the company car for private use is not permitted, any such use may be regarded as OMB Type S if the purpose was to benefit from it.

Employee Theft

Employee theft is by far the most pervasive and intriguing form of organizational misbehavior, and one of the costliest. Employees at all levels take home office supplies such as paper clips, return late from breaks, misuse computer time, falsify reimbursement requests, embezzle monies, cheat customers, use a design idea for private business—theft of some valuable organizational resource. It is estimated that 75% of organizational members steal something of value from their workplace at least once, and that most damage is not due to isolated grand theft cases, but to the accumulation of petty theft. To the extent that people desire to present themselves as behaving in a morally appropriate manner, they attempt to negotiate the legitimacy of their acts of taking with others who threaten to impose labels (e.g., "thief") that challenge their moral self-images. Efforts to dissuade others from interpreting one's taking behavior as acts of theft involve different mental mechanisms and tactics such as neutralization and rationalization. Greenberg (1997) proposed that employee theft may be deterred by efforts to counter these cognitive strategies as well as attempts to strengthen inhibiting forces and weaken encouraging forces.

Sabotage and Vandalism

Undoubtedly, the most blatant manifestations of employee misconduct that target the organization's products and property with the intention to inflict some damage are vandalism and sabotage. Giacalone and Rosenfeld (1987) suggested that employee sabotage occurs when people who are currently employed in an organization engage in intentional behaviors that effectively damage that firm's property, reputation, products, or services. Harris and Ogbonna (2006) found evidence of deliberate employee misbehavior—sabotage—in a variety of service settings. Some mild forms of sabotage and vandalism, such as graffiti or spreading rumors maligning the employer, are quite

often dismissed by management and may at times even be tolerated. Any act that purposely inflicts some damage on the organization as a whole, its assets, or its stakeholders we regard as OMB Type D—damaging, destructive, or disparaging behavior committed intentionally.

Cyber Crime

One of the most frightening documents we read on computer-related misbehavior is Cornwall's (1987) book *Datatheft*. It chillingly describes the endless opportunities to misbehave, the unlimited possibilities that the computer and the telecommunication systems provide and the incredible repertoire of activities they generate. With the Internet's infinite capabilities of handling sensitive data, the opportunities to steal and manipulate other people's data have risen exponentially.

A MODEL OF OMB MANAGEMENT

This framework posits four key points of intervention along the OMB process by which the organization may act to lower the probability of organizational misbehavior occurring (thus minimizing costs and other negative consequences). These four action levers differ with respect to their focus, and hence, call for different kinds of interventions. One important implication derived from this perspective is that we should think of the management of OMB not as a linear but as an iterative process (i.e., dynamic, repetitive, ongoing). Furthermore, the organization may apply a preventive strategy (i.e., try to prevent OMB) or a responsive strategy (react to identifiable OMB), or both. The key issue is, "To what extent does the intervention succeed in lowering the level and frequency of the misbehavior?"

In order to cope with organizational misbehavior, one must be familiar with the dynamics of the phenomenon. That is, management needs to gain an understanding of why employees intend to misbehave. Management should also be aware of the organizational forces that influence (increase or decrease) the intention to misbehave, and what are the possible expressions and costs that are to be expected. It is, however, important to keep in mind that there are possible beneficial as well as adverse consequences of the intervention(s) designed to control these behaviors.

We do not intend to provide the reader with a complete one-size-fits-all remedy to organizational misbehavior—such a panacea is beyond our reach. After all, work organizations differ in their goals, values, culture, rules, norms, and design, as well as in their control systems and the built-in opportunities they provide their members to misbehave. Similarly, employees differ in their personality traits, personal needs, attitudes, intentions, and desires. Thus, the varieties of possible forms of misbehavior, as well as the ways to confront them, make it impossible to cover the whole range of possible antecedents and expressions

of OMB and to develop and implement a generic solution. Our goal is to offer some aids for the decision makers and organization development practitioners in their attempt to cope with the problem, to present the reader with guidelines for dealing with the relevant issues and devising proper alternatives for action. A word of caution: Interventions designed to prevent OMB may have an *adverse* impact on the level of OMB if not designed and implemented carefully and sensitively.

The Rationale for OMB Management

Although the costs of OMB alone may give sufficient reason for management to attempt to control it, other rationales exist as well. First and foremost is the legal rationale: Many forms of OMB (e.g., theft, homicide, fraud, sexual harassment, discrimination) are legally forbidden by state regulations which employers are obliged to enforce. Moreover, companies are typically considered liable for the actions of their employees even when these actions are not in accordance with company policies, and firms can be held responsible for employees' OMB. For example, employers may be held liable of negligent hiring or negligent retention of employees with a known propensity for violence (Towler, 2001).

As shown above, the wide range of recorded manifestations and the heavy social and economic price tag they bear clearly indicate that organizational misbehavior cannot be perceived as a marginal aspect of the organizational life nor can it be overlooked. Managers should be aware of the phenomenon, its negative consequences to the organization and its stakeholders, and their need to alleviate the problem.

Prevention and Response

Researchers debate whether the organization should focus its efforts to cope with OMB in preventive activities (e.g., use selection procedures to screen out potential troublemakers, design the job a-priori so that it does not allow autonomy-related misbehavior), or responsive activities (e.g., termination of employees caught stealing). Denenberg and Braverman (1999) argued that trying to identify the cause of violence (and for that matter, any form of OMB) makes less practical sense than examining the capacity of the organization to respond to the signs of stress or potential danger, whatever their origin. Prevention, they argue, lies in recognizing the need for a prompt and effective response as soon as early signs (such as distress) appear. Hence, a more significant question, they claim, is not what causes organizational misbehavior, but rather, how well (i.e., quickly and efficiently) does the system respond to misbehavior (irrespective of the cause).

We follow Collins and Griffin's (1998) proposed approach that counterproductive workplace behavior can be managed through the prevention of dysfunctional activities, the maintenance of functional work behavior, and

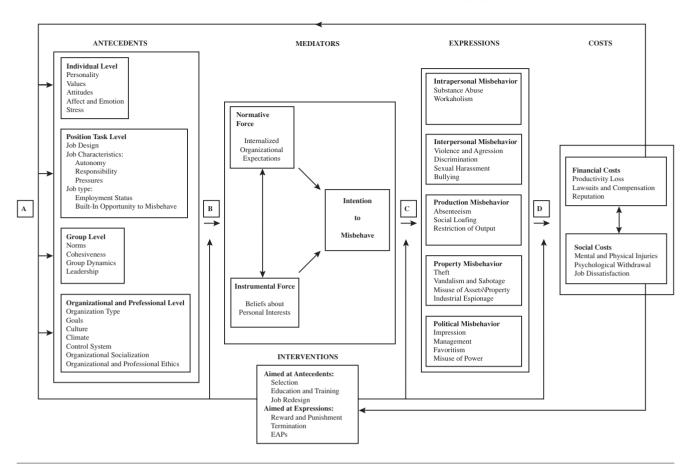


Figure 72.1 An Integrative Model of Organizational Misbehavior Management

the discharge of counterproductive employees when other means have failed. Prevention, they claim, begins with personnel selection and screening using cognitive ability (e.g., critical reasoning, interpersonal problem solving) and personality (e.g., reliability) tests designed to predict both productive and counterproductive job performance. Maintenance involves the integration of the newly hired employee into the organization through regulated practices, procedures, and culture.

Figure 72.1 presents an integrative model of organizational misbehavior. It identifies four main points of intervention designed to decrease the likelihood of OMB occurring. These interventions are assumed to influence the future recurrence of the misbehavior by affecting actors' intention to misbehave, directly or indirectly.

OMB Interventions

By OMB interventions, we mean any planned action taken by the organization in order to cope (i.e., prevent, control and/or respond) with organizational misbehavior with the intention of reducing the probability, frequency, scope, and costs. Our model suggests four points of intervention, in which the organization may attempt to intervene and lower the possibility of organizational misbehavior

taking place. These phases are marked A, B, C, and D. As depicted, these four action levers address the four main transitions in the process: the preliminary phase (A), which can also be thought of as the costs \rightarrow antecedents transition when dealing with second-order misbehavior; antecedents \rightarrow intention transition (B); intention \rightarrow expressions transition (C); and expressions \rightarrow costs transition (D). Importantly, it is assumed that at all points, the intervention influence the possibility of the recurrence of the misbehavior by affecting actors' and colleagues' intentions to misbehave, either directly (phases B and C) or indirectly (phases A and D). The following section discusses these four points of intervention in depth.

Phase A: Preemployment

At this stage, interventions can be designed to prevent misbehavior from occurring in the first place or to alter the existing antecedents to prevent misbehavior. Use of selection techniques and careful job design/redesign methodologies are two examples for such interventions. The goal at this stage should be keeping potential OMB-related antecedents *out* of the organization. Such tactics may sometimes be problematic, as with the case of a job that requires assertiveness (e.g., sales people)—a personality trait that

is arguably desirable, yet not too dissimilar and not easily differentiated in the selection stage from aggressiveness, which might lead to violent behavior on the job.

Phase B: Socialization

The intention formation stage (the antecedent → intention transition or phase B) calls for two axes of intervention: one that is aimed at affecting the normative force and one that is aimed at affecting the instrumental force. In both cases, the goal is to lower the possibility of a given antecedent(s) to trigger the intention to misbehave. In other words, interventions at this stage need to enhance the identification of the sense of wrongdoing within the individual—the understanding that, for example, stealing is wrong, or that violence is not the solution—while at the same time reducing the instrumental motive to misbehave ("If I am caught stealing I might get fired").

An intervention at this point may address a specific antecedent (e.g., personal attitudes, built-in opportunity) or, assuming that the antecedents have a common denominator(s), be designed to address one or more of the four possible levels of antecedents (i.e., individual, task/position, group or organization). For example, job redesign may reduce the built-in opportunity to misbehave (i.e., reduce the instrumental force) while a systemwide effort to disseminate, communicate, and implement a nonmisbehavior policy (i.e., cultural change) throughout the organization may reduce the normative force. Some interventions may influence both normative and instrumental forces: a formal mentorship program, for example, may help communicate values of proper conduct to newcomers (normative), as well as the possible sanctions facing misbehavior (instrumental).

Phase C: Behavior Control

The focus of intervention at this stage shifts from prevention to deterrence. That is, from reducing the likelihood of the intention to misbehave to arise to actively reducing the probability of this intention of turning into an action. Naturally, reward, control, and sanction systems, which may deter employees from carrying out their intentions because of fear of the associated punishment, play a major role. Consider the use of tracking devices (control) combined with use of bonuses and employee stock options (rewards). An embittered employee may not choose to misbehave if he knows that he is being closely monitored and that if caught he may lose a bonus or, in more serious cases, his job.

Phase D: Corrective Measures

Interventions in point D (expressions → costs transition) have three goals: (a) minimizing the costs of the misbehavior, (b) restoring the damage, and (c) providing assistance (to both perpetrators and targets). Hence, periodical drug

tests, for example, may help in identifying substance abuse, thus lowering the rate of accidents on the job. The substance abusers can participate in rehabilitation programs. Similarly, employee assistance programs (EAPs) for victims of violence or sexual harassment may contribute to their early return to work while reducing the possibility of secondorder misbehavior perpetrated against their assessor(s) or a third party. It may reduce the possibility that the victims might sue their employer. As in point A, interventions at this stage may address a specific expression (e.g., theft, sexual harassment) or, assuming a common denominator(s), one or more of the five categories of expressions (i.e., production, property, interpersonal, intrapersonal, and political misbehavior). Hence, sanctions may reduce future absenteeism, while team-building interventions can be designed to cope with high levels of observed interpersonal misbehavior (e.g., aggression, bullying, withholding information, lack of cooperation) associated with a specific group or team within the organization.

A word of caution: OMB interventions, if not designed and applied carefully and wisely might, in fact, foster OMB. Punishment, for example, needs to be perceived as justified and proportionally relative to the severance of the act in order to be accepted as legitimate.

To conclude, the suggested guidelines for OMB management and interventions for its control are as follows:

- First, OMB management is a dynamic, ongoing process, similar to the other conventional practices of administration and development, and is, in fact, part of it.
- Second, there is no panacea for organization misbehavior; there is no one-size-fits-all remedy for OMB. Control mechanisms for its reduction need to be based on the specific needs of the organization, the members, and the organizational context. That is, the general phenomenon of OMB needs to be carefully analyzed and its components (antecedents and/or expressions) must be clarified and understood before designing and applying any interventions.
- Third, there are four main points of intervention through which the organization may attempt to control OMB. The intervention points differ in relation to their focus, yet the general purpose of all OMB interventions should be minimizing (i.e., weakening) the relationships between antecedents, mediators, expressions, and consequences of the OMB cycle, with the intention of preventing undesirable behaviors (just as organizational change efforts are designed to enhance desirable ones). Obviously, some interventions or mechanisms may be used in more than one point throughout this process, and different interventions may be applied simultaneously. For example, in a transportation company whose drivers were involved in accidents (costs) due to substance abuse (expression), it may be wise to establish periodic drug testing programs and send substance abusers to rehabilitation programs (phase D interventions). Also, new employees should be tested for substance abuse prior to hiring, as part of the selection process (phase A

- interventions). A successful coping strategy calls for the simultaneous application of a combination of interventions, at different stages.
- Fourth, for OMB interventions to be effective, they should be designed so that the employees perceive them as legitimate and justified. Perceived lack of fairness may lead to more severe forms of misbehavior in reaction to the imposed sanctions. This leads to the assertion that OMB interventions, like other managerial practices, need to be constantly assessed for efficiency and effectiveness relative to their goals. Finally, while designing interventions, managers should consider the possibility that an intervention—be it because of faulty design, improper application, or inappropriateness—may have undesired effects and may even trigger misbehavior.

REFERENCES AND FURTHER READINGS

- Ackroyd, S., & Thompson, P. (1999). *Organizational misbehaviour*. London: Sage.
- Analoui, F., & Kakabadse, A. (1992). Unconventional practices at work: Insight and analysis through participant observation. *Journal of Managerial Psychology*, 7(5), 6–12.
- Andersson, L. M. (1996). Employee cynicism: An examination using a contract violation framework. *Human Relations*, 49(11), 1395–1418.
- Andersson, L. M., & Pearson, C. M. (1999). Tit for tat? The spiraling effect of incivility in the workplace. *Academy of Management Review*, 24(3), 452–471.
- Ashton, M. C. (1998). Personality and job performance: The importance of narrow traits. *Journal of Organizational Behavior*, 19(3), 289–303.
- Avolio, B. (1999). Full leadership development: Building on vital forces in organizations. Thousand Oaks, CA: Sage.
- Bacharach, S. B., Bamberger, P., & Sonnenstuhl, W. J. (2002). Driven to drink: Managerial control, work related risk factors and employee drinking behavior. *Academy of Management Journal*, 45(4), 637–658.
- Bandura, A. (1973). *Aggression: A social learning analysis*. Englewood Cliffs, NJ: Prentice-Hall.
- Baron, R. A., & Neuman, J. H. (1996). Workplace violence and workplace aggression: Evidence on their relative frequency and potential causes. *Aggressive Behavior*, 22(3), 161–173.
- Boddy, C. R. (2006). The dark side of management decisions: Organizational psychopaths. *Management Decision*, 44(10), 1461–1475.
- Boye, M. W., & Jones, J. W. (1997). Organizational culture and employee counterproductivity. In R. A. Giacalone & J. Greenberg (Eds.), *Antisocial behavior in organizations* (pp. 18–36). Thousand Oaks, CA: Sage.
- Cleveland, J. N., Stockdale, M., & Murphy, K. R. (2000). Women and men in organizations: Sex and gender issues at work. Mahway, NJ: Lawrence Erlbaum Associates.
- Collins, J. M., & Griffin, R. W. (1998). The psychology of counterproductive job performance. In R. W. Griffin, A. M. O'Leary-Kelly, & J. M. Collins (Eds.), *Dysfunctional be-havior in organizations* (pp. 219–242). Stamford, CT: JAI Press.

- Cornwall, H. (1987). *Datatheft: Computer fraud, industrial espionage, and information crime*. London: Heinemann.
- Denenberg, R. V., & Braverman, M. (1999). The violence-prone workplace: A new approach to dealing with hostile, threatening, and uncivil behavior. Ithaca, NY: ILR Press.
- Fox. S., & Spector, P. E. (1999). A model of work frustration-aggression. *Journal of Organizational Behavior*, 20(6), 915–931.
- Fox. S., & Spector, P. E. (Eds.). (2005). Counterproductive work behavior: investigations of actors and targets. Washington, DC: American Psychological Association.
- Gabriel, Y. (1998). An introduction to the social psychology of insults in organizations. *Human Relations*, 51(11), 1329– 1354.
- Giacalone, R. A., & Greenberg, J. (1997). *Antisocial behaviors in organizations*. Thousand Oaks, CA: Sage.
- Giacalone, R. A., & Rosenfeld, P. (1987). Reasons for employee sabotage in the workplace. *Journal of Business Psychology*, 1(4), 367–378.
- Goffman, E. (1971). The presentation of self in everyday life. Harmondsworth, UK: Penguin.
- Greenberg, J. (1990). Employee theft as a response to underemployment inequity: The hidden cost of pay cuts. *Journal of Applied Psychology*, 75(5), 561–568.
- Greenberg, J. (1997). The steal motive: Management the social determinants of employee theft. In R. A. Giacalone & J. Greenberg (Eds.), *Antisocial behavior in organizations* (pp. 85–107). Thousand Oaks, CA: Sage.
- Griffin, R. W., & O'Leary-Kelly, A. M. (Eds.). (2004). The dark side of organizational behavior. San Francisco: Jossey-Bass.
- Griffin, R. W., O'Leary-Kelly, A. M., & Collins, J. M. (1998). Dysfunctional work behaviors in organizations. In C. L. Cooper & D. M. Rousseau (Eds.), *Trends in organizational behavior* (pp. 65–82). New York: Wiley.
- Hackett, R. D. (1989). Work attitudes and employee absenteeism: A synthesis of the literature. *Journal of Occupational Psychology*, 62(3), 235–248.
- Harris, L. C., & Ogbonna, E. (2006). Service sabotage: A study of antecedents and consequences. *Academy of Marketing Science*, *34*(4), 543–516.
- Hollinger, R. C. (1986). Acts against the workplace: Social bonding and employee deviance. *Deviant Behavior*, 7(1), 53–75.
- Ivancevich, J. M., Konopaske, R., & Matteson, M. T. (2005). Organizational behavior and management. New York: McGraw-Hill.
- Kanter, D. L., & Mirvis, P. H. (1989). *The cynical Americans*. San Francisco: Jossey-Bass.
- Kets de Vries, F. R., & Miller, D. (1984). *The neurotic organization*. San Francisco: Jossey-Bass.
- Kidwell, R. E., & Bennett, N. (1993). Employee propensity to withhold effort: A conceptual model to intersect three avenues of research. *Academy of Management Review*, 18(3), 429–456.
- Kidwell, R. E., & Martin, C. L. (Eds.). (2005). *Managing organizational deviance*. Thousand Oaks, CA: Sage.
- Klein, R. L., Leong, G. B., & Silva, J. A. (1996). Employee sabotage in the workplace: A biopsychosocial model. *Journal of Forensic Sciences*, 41(1), 52–55.
- Mangione, T. W., & Quinn, R. P. (1975). Job satisfaction, counterproductive behavior, and drug use at work. *Journal of Applied Psychology*, 60(1), 114–116.

- Mangione, T. W., Howland, J., & Lee, M. (1998). New perspectives for worksite alcohol strategies: Results from a corporate drinking study. Boston: JSI Research and Training.
- Mantell, M. (1994). *Ticking bombs: Defusing violence in the workplace*. Burr Ridge, IL: Irwin.
- McLean Parks, J. (1997). The fourth arm of justice: The art and science of revenge. In R. J. Lewicki, B. H. Sheppard, & R. Bies (Eds.). *Research on negotiation in organizations* (Vol. 6, pp. 113–144). St. Louis, MO: Elsevier.
- Miceli, M. P., & Near, J. P. (1997). Whistle blowing as antisocial behavior. In R. A. Giacalone & J. Greenberg (Eds.), *Antisocial behavior in organizations* (pp. 130–150). Thousand Oaks, CA: Sage.
- Moberg, D. J. (1997). On employee vice. Business Ethics Quarterly, 7(4), 41–60.
- Morrison, E. (2006). Doing the job well: An investigation of prosocial rule breaking. *Journal of Management*, 32(1), 5–28.
- O'Leary-Kelly, A. M., Griffin, R. W., & Glew, D. J. (1996). Organization-motivated aggression: A research framework. *Academy of Management Review*, 21(1), 225–253.
- Peiperl, M., & Jones, B. (2001). Workaholics and overworkers: Productivity or pathology? *Group & Organization Management*, 26(3), 369–393.
- Puffer, S. M. (1987). Pro social behavior, noncompliant behavior, and work performance among commission salespeople. *Journal of Applied Psychology*, 72(4), 615–621.
- Robinson, S. L., & Bennett, R. J. (1995). A typology of deviant workplace behaviors: A multidimensional scaling study. *Academy of Management Journal*, *38*(2), 555–572.
- Robinson, S. L., & O'Leary-Kelly, A. M. (1998). Monkey see, monkey do: The influence of work groups on the antisocial behavior of employees. *Academy of Management Journal*, 41(6), 658–672.
- Sackett, P. R., & Devore, C. J. (2001). Counterproductive behaviors at work. In N. Anderson, D. S. Ones, H. K. Sinangil & C. Viswesvaran (Eds.), *Handbook of industrial*, work and organizational psychology (Vol. 1, pp. 145–164). London: Sage.
- Salancik, G., & Pfeffer, J. (1978). A social information processing approach to job attitudes and task design. *Administrative Science Quarterly*, 23(2), 224–253.
- Schneider, K. T., Swan, S., & Fitzgerald, L. F. (1997). Job-related and psychological effects of sexual harassment in the workplace: Empirical evidence from two organizations. *Journal of Applied Psychology*, 82(3), 401–415.

- Skarlicki, D. P., & Folger, R. (1997). Retaliation in the workplace: The roles of distributive, procedural, and interactional justice. *Journal of Applied Psychology*, 82(3), 434–443.
- Stein, B. A., & Kanter, R. M. (1993). Why do good people do bad things: A retrospective of the Hubble fiasco. *Academy of Management Executive*, 7(4), 58–62.
- Towler, J. (2001). Don't hire a killer—How to avoid violence prone employees. Kitchener, Ontario, Canada: Creative Organizational Design. Retrieved September 10, 2007, from http://www.creativeorgdesign.com/downloads/articles/Don' t%20Hire%20A%20Killer.pdf
- Trevino, L. K. (1986). Ethical decision making in organizations: A person-situation interactionist model. Academy of Management Review, 11(3), 601–617.
- Trevino, L. K., Weaver, G. R., & Reynolds, S. J. (2006). Behavioral ethics in organizations: A review. *Journal of Management*, 32(6), 951–990.
- Vardi, Y. (2001). The effects of organizational and ethical climates on misconduct at work. *Journal of Business Ethics*, 29(4), 325–337.
- Vardi, Y., & Weitz, E. (2001, August). Lead them not to temptation: Job autonomy as an antecedent of organizational misbehavior. Paper presented at the Academy of Management Meeting, Washington, DC.
- Vardi, Y., & Weitz, E. (2004). Misbehavior in organizations: Theory, research and management. Mahwah, NJ: Lawrence Erlbaum Associates.
- Vardi, Y., & Wiener, Y. (1992, August). Organizational misbehavior (OMB): Toward a motivational model. Paper presented at the annual meeting of Academy of Management, Miami Beach, FL.
- Vardi, Y., & Wiener, Y. (1996). Misbehavior in organizations: A motivational framework. *Organization Science*, 7(2), 151–165
- Vigoda, E. (1997). Organizational politics: Characteristics, antecedents, and implications of interpersonal influence processes on employee performance in the Israeli public sector. Unpublished doctoral dissertation, University of Haifa, Haifa, Israel.
- Wiener, Y. (1988). Forms of value systems: A focus on organizational effectiveness and cultural change and maintenance. *Academy of Management Review, 13*(4), 534–545.

Organizational Paranoia

Origins and Dysfunctional Consequences of Exaggerated Distrust and Suspicion in the Workplace

RODERICK M. KRAMER

Stanford University

ocial scientists have long recognized the deleterious role distrust and suspicion play within organizations (Fox, 1974). More recent treatments suggest the problem continues to be an important and ongoing concern (Hardin, 2004). Despite the enduring importance of the problem, conceptual frameworks that systematically articulate the antecedents and consequences of intraorganizational distrust and suspicion remain in short supply. A primary aim of this chapter is to summarize some of what we know about the origins and dysfunctional consequences of exaggerated distrust and suspicion in the workplace. To approach these two important issues, I first provide a framework for conceptualizing exaggerated distrust and suspicion in the workplace. The framework derives from recent social cognitive theory and research on paranoid cognition.

CONCEPTUALIZING PARANOID COGNITION IN ORGANIZATIONS

To develop the concept of paranoid cognition, it is useful to begin with a brief overview of some of the more prominent images of distrust and suspicion found in the social science literature. Social scientists have conceptualized distrust as an active psychological state characterized by a specific constellation of expectations and beliefs about the lack of trustworthiness of other persons, groups, or institutions. For example, Govier (1993) defined distrust as "a lack of confidence in the other, a concern that the other may act so as to harm one, that he does not care about one's welfare or intends to act harmfully, or is hostile. When one distrusts, one is fearful and suspicious as to what the other might do" (p. 240).

As this definition suggests, suspicion is a major part of distrust. Fein (1996) characterized suspicion as a dynamic cognitive state in which a social perceiver "actively entertains multiple, plausibly rival, hypotheses about the motives or genuineness of a person's behavior" (p. 1165). Fein and Hilton (1994) noted further that suspicion entails a "belief that the actor's behavior may reflect a motive that the actor wants hidden from the target of his or her behavior" (p. 169).

In explaining the origins of distrust and suspicion, researchers have often noted the importance of social interactional histories. Models of trust development typically posit, for example, that an individual's judgments about another's trustworthiness or lack of trustworthiness can be construed largely as history-dependent processes. According to such conceptions, trust increases or decreases as a function of the cumulative history of interaction between two or more interdependent actors.

In suggesting the formative role that social histories play in the emergence of trust and distrust, these models imply that individuals' judgments about another's trustworthiness or lack of trustworthiness are anchored, at least in part, on their a priori expectations about the other's behavior and the extent to which subsequent experience affirms or discredits those expectations. Boyle and Bonacich's (1970) analysis of trust development supports such arguments. Individuals' expectations about trustworthy behavior, they propose, tend to change, "in the direction of experience and to a degree proportional to the difference between this experience and the initial expectations applied to it" (p. 130). In support of such arguments, numerous empirical studies have shown that interactions that reinforce individuals' expectations about others' trustworthiness increase trust, while interactions that violate those expectancies undermine trust.

Although individuals' a priori expectations clearly play an important role in judgments about others' trustworthiness, other research has shown that their a posteriori attributions also affect such judgments. According to these studies, such attributions influence the inferences social perceivers make about others' motives, intentions, and dispositions. These inferences are critical for deciding how much they should be trusted or distrusted. Experiments by Fein and his associates (Fein, 1996, Fein & Hilton, 1994; Hilton, Fein, & Miller, 1993) have shown that induced suspicion often triggers sophisticated attributional analysis "characterized by active, careful consideration of the potential motives and causes that may influence people's behaviors" (Fein, 1996, p. 1167). Their findings suggest that suspicion is evoked when perceivers have forewarnings that others might be insincere or untrustworthy, when their expectations about others have been violated, and/or when they recognize situational cues are in possession of contextual information that suggests others might have ulterior motives for their actions (Fein, 1996).

The social perceiver portrait that emerges from these diverse streams of research is compatible with the notion that people often act much like "intuitive social scientists" who try to make sense of their social worlds. According to such perspectives, people (in the ideal, at least) confer trust on others or withhold it based more or less on rational (i.e., systematic and orderly) processes of logical inference and hypothesis testing. Like good Bayesian statisticians, they update these trust judgments based on their ongoing experiences with others.

Although recognizing that trust and distrust judgments sometimes resemble this sort of mindful and rational cogitation, many researchers have noted that other variants of social distrust and suspicion appear to be far less rational with respect to both their origins and their judgmental consequences. Deutsch (1973), for example, proposed the need to distinguish between pathological and nonpathological varieties of trust and distrust. "The essential feature of nonpathological trust and distrust," he noted, "is that it is flexible and responsive to changing circumstances" (p. 170). In contrast, pathological trust and distrust are characterized by

an "inflexible, rigid, unaltering tendency to act in a trusting or suspicious manner, irrespective of the situation or the consequences of so acting" (p. 171). The pathology of such irrational trust and distrust, Deutsch went on to note, is reflected in "the indiscriminateness and incorrigibility of the behavioral tendency" they engender (p. 171). These irrational forms of distrust and suspicion reflect exaggerated perceptual and judgmental propensities. Such inclinations can arise and may be sustained even in the absence of specific experiences that justify or warrant them.

Paranoid cognitions constitute perhaps the prototypic example of such irrational distrust and suspicion. Colby (1981) defined paranoid cognition as "persecutory delusions and false beliefs whose propositional content clusters around ideas of being harassed, threatened, harmed, subjugated, persecuted, accused, mistreated, wronged, tormented, disparaged, vilified, and so on, by malevolent others, either specific individuals or groups" (p. 518). In trying to understand these rather peculiar, and in many respects striking cognitions, theorists have turned most often to psychodynamic constructs. Colby (1981), for example, described paranoid cognitions as the end products of a "causal chain of strategies for dealing with distress induced by the affect of shame-humiliation" (p. 518). The strategy of blaming others for one's difficulties functions "to repudiate the belief that the self is to blame for an inadequacy" (p. 518). The presumption behind such clinical accounts is that paranoid cognitions are reflections or manifestations of an acute intrapsychic disturbance. Such conceptions thus locate the cause of paranoid cognitions "inside the head" of the social perceiver, rather than viewing them as causally connected to the social context within which such cognitions are embedded and to which they might reflect some sort of intended adaptation.

In contrast to these clinical conceptions, recent social psychological research suggests a different perspective on paranoid cognitions, a perspective that gives more attention to their social and situational origins (Fenigstein & Vanable, 1992; Kramer, 1994, 1995a, 1995b). This research takes as a starting point two suggestive observations. The first observation is that, in milder forms, paranoid cognitions seem prevalent even among normal individuals. As Fenigstein and Vanable (1992) commented, it is not unusual for ordinary people "in their everyday behavior manifest characteristics—such as self-centered thought, suspiciousness, assumptions of ill will or hostility, and even notions of conspiratorial intent—that are reminiscent of paranoia" (p. 130). There are many social occasions where people may think they are "being talked about or feel as if everything is going against them, resulting in suspicion and mistrust of others, as though they were taking advantage of them or to blame for their difficulties" (p. 133). Based upon such observations, Fenigstein and Vanable concluded that the concept of paranoia needs broadening to "include the thought processes that characterize everyday life" (p. 133).

The second observation relates to the emergent and often transient nature of these milder forms of paranoid cognition.

As Siegel (1994) noted in this regard, "almost everyone has had a mild experience such as the vague suspicion that something is out there just waiting to get us. Many people experience it when they are alone in the house at night or walking down an unfamiliar street" (p. 7). Findings from several recent survey studies support such observations, suggesting that paranoid-like perceptions, including the perception that one has been the victim of a conspiracy involving a romance or friendship at school or work are far from uncommon.

These observations converge on two general propositions that are central to the conceptual argument I wish to advance in this chapter. First, these more ordinary variants of paranoid cognition are forms of social misperception and misjudgment characterized by misplaced or exaggerated, rather than necessarily false or delusional, distrust and suspicion of others. By shifting the reference point between reality and error, we access a large group of concepts from social cognitive theory on judgmental errors when trying to understand the cognitive and social origins of these paranoid-like social misperceptions and misjudgments.

Second, paranoid cognitions can be viewed as byproducts of an interaction between the social information processing strategies paranoid perceivers use and the social contexts in which they seem sensible, rather than as manifestations of individual psychopathology. They are efforts by social perceivers to make sense of and cope with threatening and disturbing social environments. These ordinary and more benign forms of paranoid cognition are adaptive responses to disturbing situations rather than manifestations of disturbed individuals.

ORIGINS OF PARANOID COGNITIONS IN ORGANIZATIONS

The conception of paranoid cognition developed in this chapter proceeds largely from a social information processing perspective on organizational behavior. According to this perspective, a complete understanding of paranoid cognition—or any form of social judgment in organizations —requires recognition of the organizational context within which such judgments are embedded. As Salancik and Pfeffer (1978) argued, in order to understand organizational behavior, it is essential to examine the "informational and social environment within which behavior occurs and to which it adapts" (p. 226). One reason context is so consequential, they argue, is that it selectively directs individuals' attention to certain information, making that information more salient and thereby increasing its effect on their expectations about and interpretations of others' behavior. According to this perspective, what one sees depends literally on where one sits in the organization.

From a social information processing perspective, situational factors trigger paranoid cognitions within organizations that bring on states of dysphoric self-consciousness, which is an aversive psychological state. People are moti-

vated to make sense of whatever they perceive as inducing it and adaptively respond to it. These sense-making efforts promote a hypervigilant and ruminative mode of social information processing. Hypervigilance and rumination, I posit, enjoy a circular causal relationship: The hypervigilant appraisal of social information tends to generate more raw data about which the paranoid perceiver ruminates, and rumination in turn helps generate additional paranoid-like hypotheses, prompting more vigilant scrutiny of the situation, and especially of others' behavior.

Hypervigilance and reflection are posited further to contribute to several modes of paranoid-like social misperception and misjudgment, including (a) the sinister attribution error, (b) the overly personalistic construal of social interactions, and (c) exaggerated perceptions of conspiracy. These errors and misperceptions contribute to paranoid behavior. According to this model, one of the ironic and unintended consequences of such paranoid behavior is that it tends to elicit and worsen the situations that lead to increased scrutiny and self-consciousness. Thus, within organizational systems, there is a self-sustaining and escalatory dynamic associated with paranoid social cognition and behavior.

This model is not a complete theory of paranoid cognition in organizations. It is a middle-range theory that organizes and integrates what is currently known about the cognitive and social bases of such cognition. It is presented as a heuristic device for stimulating further research and not as a final statement.

Having described the basic parts of the model, and their interrelationships, I turn now to elaborating on these elements. Dysphoric self-consciousness is one of the primary psychological precursors of paranoid cognition. Dsyphoric self-consciousness is an aversive form of heightened public self-consciousness characterized by the feeling that one is under intense evaluative scrutiny. Dysphoric self-consciousness contrasts with more positive forms of social attention, in which individuals may feel as if they are "basking" in their own or others' reflected glory. Dysphoric self-consciousness can be construed as a negative form of social attention in which one is perceived to be "baking" under the harsh, unremitting limelight of others' evaluative scrutiny.

Many studies have documented an association between self-consciousness and a tendency toward the overly personalistic construal of social interactions. Fenigstein (1984) postulated the existence of a general over perception of self as target bias. He argues that self-consciousness increases the extent to which individuals' see others' behavior in self-referential terms (i.e., as intentionally focused on, or directed toward, them). The results of his studies provide evidence that self-consciousness contributes to the onset of paranoid social cognition. They also suggest that a consequence of such self-consciousness is a spontaneous attributional search aimed at helping individuals make sense of their dysphoric experiences. When individuals become self-conscious, they look for reasons why they are selfconscious. Self-consciousness acts as a cue stimulating attributional search: If one is self-conscious, then someone must be watching. And if someone is watching, then something might be amiss. These results also invite the question of what kinds of social situations are likely to trigger such self-consciousness.

If dysphoric self-consciousness is an important causal trigger of paranoid cognition, the question then arises, "What are some of the situational or contextual factors in organizations that serve as antecedents of paranoid cognition?" I address this question in the following subsections.

Perceived Distinctiveness and Paranoid Cognition

All human beings are members of multiple social groups. As a result, people can categorize themselves—and be categorized by others—in a variety of different ways. These include categorizations based upon physical attributes (such as age, race, or gender), as well as categorizations based upon social attributes such as religion, social class, and organizational affiliations. Recognizing their importance, researchers have afforded much attention in recent years to exploring how such categorization processes affect social perception and behavior within social systems (e.g., Kanter, 1977a; Kramer, 1991).

Several conclusions emerge from this research. First, social categories can affect how individuals define themselves in a given social situation, a process that Turner (1987) characterized as *self*-categorization. Research on self-categorization has shown that individuals often categorize themselves with attributes that are distinctive or unique in a given setting. For example, if an individual is the only female in a group, she may disproportionately emphasize her distinctive gender status when explaining her behavior, affecting not only how others see her, but also how she sees herself. From a cognitive standpoint, the distinctiveness of this category makes gender-based attributes more available during social information processing. They tend to "loom larger" during social interaction, affecting the social inference process for both actor and observer.

Projecting from such evidence, it can be argued that individuals who belong to distinctive social categories are more likely to be self-conscious. Because they feel they are different from other group members, they overestimate the extent to which they are under evaluative scrutiny by other group members. The argument that self-categorization on the basis of distinctive or exceptional status can contribute to the perception of being under evaluative scrutiny and dysphoric self-consciousness is consistent with a considerable body of evidence about the cognitive and social consequences of merely being different from other members of a social group (Kanter, 1977a, 1977b).

One result of individuals' awareness of being different from others is that it prompts sense-making activity, including a spontaneous attributional search for the causes of others' behavior toward them. Such self-consciousness might be expected to be especially pronounced and aversive when individuals are uncertain about precisely how much being different from others matters (e.g., its impact on whether they will be accepted by others and the kind of treatment they will receive from them). So-called token members of groups or organizations exemplify this quandary. Token status in groups is based upon "ascribed characteristics (master statuses such as sex, race, religion, ethnic group, age, etc.) or other characteristics that carry with them a set of assumptions about culture, status, and behavior that are highly salient for majority category members" (Kanter, 1977b, p. 966). In her now classic discussion of the effects of token status on social perception and interpersonal relations, Kanter (1977a, 1977b) noted that individuals who are members of token categories are likely to attract disproportionate attention from other group members, particularly those who enjoy dominant status from their greater numerical proportion. For example, she argued that females in many American corporations often feel as if they are in the "limelight" compared to their more numerous male counterparts.

In support of these observations, Taylor (1981) demonstrated that observers often allocate disproportionate amounts of attention to individuals who have token status in groups, especially when making attributions about group processes and outcomes. Lord and Saenz (1985) provided an important extension of this early work by showing how token status affects the cognitive processes of tokens themselves. They concluded that, "Tokens feel the social pressure of imagined audience scrutiny, and may do so even when the 'audience' of majority group members treat them no differently from nontokens" (p. 919).

On the basis of such evidence, it can be argued that individuals who have token status in a social system will be more self-conscious and perceive themselves as under more evaluative scrutiny than nontoken members. Tokens will tend to overestimate the extent to which they are the target of other's attention. They will be more likely to overconstrue their interactions with other group members—especially interactions involving nontokens—in personalistic, self-referential terms. Evidence in support of this general hypothesis was provided in a study of social perception among incoming Masters of Business Administration (MBA) students at a major business school during the first term of their 2-year program (Kramer, 1996).

Uncertainty About Social Standing

Social standing is another situational factor that might induce dysphoric self-consciousness and contribute to the emergence of paranoid cognition. Research suggests that people often afford considerable importance to information about their standing in social groups and organizations. As Tyler (1993) noted, one reason that people attach importance to such information is that they believe it will "tell them something about whether they will be treated fairly and whether they are valued" by other group or organization members (p. 143). A large body of theory and research can be adduced in support of the related proposition that

most people experience uncertainty about their standing in a social system as an aversive psychological state and are highly motivated to reduce it.

This evidence suggests that a factor that contributes to the onset of situationally induced paranoia is an individual's length of time as a member of a group or organization. There are several reasons why such tenure status might correlate with their susceptibility to paranoid social cognitions (Fine & Holyfield, 1996). First, as tenure increases, people can gain much information about their standing in a group. As experienced group members, they become knowledgeable about, and comfortable with, group norms and interaction routines. Such "old timers" know where they stand because they have successfully negotiated their place in the group or organization. Their uncertainty—and the social anxieties that attend such uncertainty—likely is relatively low. In contrast, newcomers to a group are likely to have greater uncertainty and insecurity about their standing in the group. Because they are still negotiating their place in the social order, they are likely concerned with such things as how well they will fit into the group's culture and whether they will be accepted by other group members. They also may be anxious about how well they will perform in their expected roles. As a result of such uncertainties, newcomers are likely to be relatively self-conscious during their social interactions, experiencing a form of intragroup anxiety similar to and no less distressing than the intergroup anxiety described by Stephan and Stephan (1985).

Because their social uncertainty and the motivation to reduce it are both high, newcomers to a group should, all else equal, be fairly vigilant and proactive when seeking diagnostic information about their standing. They will find salient and actively process information about how they are treated during their interactions and exchanges with other members as clues to their group standing. Such information is "communicated both by interpersonal aspects of treatment—politeness and/or respect—and by the attention paid to a person as a full group member" (Tyler, 1993, p. 148).

From an attributional standpoint the diagnostic value of such information is often problematic, because the correct interpretation of many social interactions among group members is often ambiguous. The cause of another person's behavior is almost always subject to multiple interpretations, making the attribution process difficult even for the most motivated intuitive scientist. For example, the fact that a faculty colleague in a university department (O) fails to say hello to another faculty member (S) as they pass each other in the hallway on a Monday morning may reflect a personalistic cause (O is angry at S for something S said or did at the last faculty meeting). Many nonpersonalistic causes may also explain O's behavior (e.g., O was preoccupied by a traffic ticket received on the way to work that morning and did not even notice S as they passed each other).

From a normative standpoint, individuals should discount the validity of any particular explanation for another

person's behavior when multiple, competing explanations for that behavior are available. Even when individuals suspect they are the target or cause of another's behavior, they should discount this personalistic attribution until more conclusive evidence is available. Despite the logical inappropriateness of doing so, people often make overly personalistic attributions of others' actions even when competing explanations for those actions are readily available (Fenigstein, 1979; Fenigstein & Vanable, 1992). Extrapolating from this research, it might be expected that newer members of a group, all else equal, will be more self-conscious and more likely to construe their interactions with other group members in overly personalistic terms, compared to those with longer tenure in the group. This tendency may be especially pronounced in unequal status interactions (i.e., interactions between lower and higher status group members). Such interactions might be expected to be particularly salient to newcomers, and information about such encounters is processed more extensively because of its greater putative diagnostic value. For example, to the newly hired assistant professor in a department, interactions involving senior colleagues might be expected to be more noticeable and processed more extensively than comparable interactions with other assistant professors. An ambiguous act, such as passing by in the hallway without saying hello, may be attributed to simple rudeness, arrogance, or social awkwardness if done by another new assistant professor. The same behavior by a senior colleague may be interpreted more ominously as evidence that the person does not like one or did not want to see one hired in the first place. According to this logic, the tendency to make overly personalistic attributions about another's behavior should be particularly pronounced with respect to interactions involving newcomers and those with longer tenure. The results of two studies support these hypothesized relations (Kramer, 1994, 1996).

The results of these studies converge on several conclusions. First, situational cues that trigger dysphoric forms of self-consciousness are likely to promote paranoid-like (mis)construals of social interactions. Second, they suggest how ordinary cognitive strategies for coping with such implicit social threats contribute to the emergence of paranoid cogitation. They also suggest that paranoid perceivers tend to categorize and interpret more of others' behaviors as diagnostic of their standing. They are more likely to engage in intense thoughts about such behaviors compared to their less paranoid counterparts. While it is obvious that low trust and paranoid cognition are far from equal constructs, these findings suggest that people with low expectations about others' trustworthiness are more vigilant and perceptually prepared to find evidence of others' lack of trustworthiness. As Colby (1975) noted, the state of the paranoid perceiver is not unlike that of a spy in a dangerous foreign country:

To him, everyone he meets is a potential enemy, a threat to existence who must be evaluated for malevolence. To survive, he must be hypervigilant and fully mobilized to attack, to flee, to stalk. In this situation, appearances are not to be taken at face value... but each must be attended to and interpreted in order to detect malevolence. (p. 2)

DYSFUNCTIONAL CONSEQUENCES OF PARANOID COGNITION IN THE WORKPLACE

The harmful effect of paranoid cognition on judgments about distrust and suspicion of others in the workplace can be viewed from two vantage points. First, they can be approached from the perspective of how they affect perceivers' *presumptive trust* in other coworkers (i.e., their *a priori* expectations about others' trustworthiness). Second, they can be approached from the perspective of how they affect the attributions they make about others' observed behavior. Research has investigated several specific manifestations of these two forms of social misjudgment.

Sinister Attribution Error

The sinister attribution error or bias refers to the tendency for social perceivers to overattribute lack of trustworthiness to others (Kramer, 1994). In contrast to the sort of "active, careful consideration of the potential motives and causes that may affect people's behaviors" described by Fein (1996, p. 1167), the sinister attribution bias is associated with the tendency to be overly suspicious of others' intentions and motives (i.e., to "go beyond" available data when making such inferences).

Overly Personalistic Construal of Social Interactions

A second judgmental bias associated with paranoid cognition is the tendency for paranoid perceivers to view others' actions in unrealistically self-referential terms. As Colby (1981) noted in his discussion of clinical paranoia: "Around the central core of persecutory delusions [that preoccupy the paranoid perceiver] there exists a number of attendant properties such as suspiciousness, hypersensitivity, hostility, fearfulness, and self-reference that lead such individuals to interpret events that have nothing to do with them as bearing on them personally" (p. 518). Because of this overly personalistic construal of social interaction, paranoid perceivers overestimate the extent to which they are the target of others' thoughts and actions. Many studies described earlier show some ways heightened self-consciousness and the perception of being under evaluative scrutiny by others contributes to this tendency.

A particularly interesting form of this bias is the *biased* punctuation of social interaction. The notion of biased punctuation comes from research showing that when individuals view ongoing social events, they typically do not perceive them as continuous events. Instead, they tend to perceive social interactions as discrete episodes or "punc-

tuated" sequences with distinct "chunks" of causally interdependent activity. Conflict research further suggests that biased punctuation of interactions contribute to the development of what Deutsch (1986) colorfully characterized as "malignant spirals" of distrust and suspicion.

Gilovich (1991) has a perceptive analysis of how ordinary and innocent constraints on people's chances to generate representative samples of experience can lead them to idiosyncratic punctuations that foster erroneous inferences from the informal observations they allow:

[As I stand impatiently waiting for a bus] I can become convinced that all of the buses are headed in the wrong direction by observing quite a number headed the wrong way before I encounter one going in my direction. Note that the opposite cannot happen: Unless I have difficulty boarding, I never observe several going my way before I discover one headed in the opposite direction. If a bus is going in my direction, I take it. Because of this asymmetry, we can experience a certain kind of "bad streak," but not a complementary streak of good fortune. (p. 68, [italics added])

For the hypervigilant paranoid perceiver, such "patterns" are likely to loom especially large and, through rumination, they are embellished. Because of their vigilance and thought, they are likely to link even logically disparate but temporally proximate events together in a coherent, causal sequence.

Exaggerated Perceptions of Conspiracy

Exaggerated perceptions of conspiracy are another form of paranoid social cognition. The phrase *exaggerated perception of conspiracy* refers to a paranoid perceivers' tendency to overattribute social coherence and coordination to others' actions. Just as the biased punctuation of social interaction is an overperception of episodic or causal linkages among disparate, independent events, exaggerated perceptions of conspiracy are the overperception of *social* linkages among actors engaged in independent actions.

Conspiracy perceptions are complex cognitions and have been the subject of much study by social scientists from a variety of disciplines. From the standpoint of the theory of organizational paranoid cognition developed here, conspiracy perceptions can be viewed as the end result of an intentional rational effort by social perceivers to make sense out of their seemingly recurring dysphoric experiences. As Baumeister (1991) noted,

Meaning is a matter of associations—of connecting things up into broad patterns. If the only broad pattern is happy and optimistic, then isolated contradictory events can be dismissed as minor problems and annoyances. Each problem seems minor and trivial in comparison with the totality of positive aspects. The crucial step occurs, however, when these contradictory events link together to form a larger pattern of negative, dissonant though. (p. 304, [italics added])

SUMMARY AND CONCLUSIONS

This chapter has described some antecedents and dysfunctional consequences of workplace paranoia. In putting the contributions of the present framework in perspective, it is useful to raise at the outset a few caveats about the logic of the arguments. First, many labels used for the constructs, such as "paranoid cognition" and "irrational suspicion," may be viewed by some as loaded and excessively negative. In effect, they seem to blame the victim as they imply there is something amiss inside the social perceiver's head, rather than something flowing from his or her social circumstances. For example, characterizing the cognitive processes of individuals who happen to occupy relatively disadvantaged positions within organizations as "paranoid" might seem to minimize the legitimacy of their concerns, deflecting attention from the situational origins of their plight. Much like the clinical conceptions avoided at the outset of this paper, they suggest a fundamental attribution error by ignoring the role situations play in shaping these cognitions. This is far from the intent of the present analysis, however. The spirit of this analysis has been to suggest how certain "locations" within organizational systems can affect the focus, direction, and intensity of social information processing. The research assumed as a point of departure the more serious presumption that what is seen depends upon where one is standing in a social system. Certain structural positions within an organizational system may more likely promote patterns of misconstrual and misattribution than other locations in social systems.

Along similar lines, terms such as "sinister attribution error" and "overly personalistic construal" might be regarded as casting unwarranted aspersions on the cognitive competence of the hapless perceiver by implying a flawed process of social inference. In defense of this label, I argue that, the research reviewed here shows that psychological processes such as dysphoric self-consciousness and rumination lead to systematic (i.e., directional) distortions in the attribution process. Terms such as error and bias seem appropriate and their usage congruent with social psychological tradition with respect to other attributional errors, such as the fundamental attribution error and the ultimate attribution error. A better understanding of the situational bases of such errors and biases is a critical first step toward the development of not only richer theory about distrust and suspicion, but also more efficacious behavioral technologies for building and restoring trust within organizations.

In making this point, it is crucial not to misconstrue such cognitive errors as judgmental errors in a more existential sense. As a large body of social cognitive research has shown, many of these cognitive processes help people make sense of themselves and other people as they navigate through various social situations. Social cogitation may be constructive, but it is also intentionally adaptive. In many social situations, the costs associated with misplaced trust may be substantial and, in some instances, outweigh the

costs associated with misplaced distrust. For example, in highly competitive or political organizations, a propensity toward vigilance with respect to detecting others' lack of trustworthiness may be prudent and adaptive. In such environments, it may be far better to be safe than sorry.

Such arguments prompt consideration of other potentially adaptive functions that paranoid cognitions play in organizational settings. While the arguments here have emphasized the maladaptive cognitive and behavioral results of paranoid cognition, there are several ways in which the cognitive processes associated with paranoid perception (i.e., heightened vigilance and rumination) may have adaptive consequences, especially for individuals who are relatively disadvantaged with respect to their power or status in an organizational system. First, as just noted, distrust is not always irrational. Although individuals' fears and suspicions may sometimes be exaggerated, this does not mean that their distrust is necessarily without foundation or basically misplaced. When viewed from this perspective, psychological states such as vigilance and rumination may be useful. For example, vigilant appraisal and mindfulness —which might be construed as more adaptive variants of hypervigilance and rumination—are enormously important cognitive orientations that not only help individuals make sense of their social situations, but also help them determine the right forms of behavior for those situations.

Paranoid cognitions may also play an important role in the maintenance of an individual's motivation and persistence in such situations. In much the same way that defensive pessimism enhances individuals' motivation to engage in effective preemptive failure avoidant behavior, so might paranoid cognitions help individuals maintain their motivation to overcome perceived dangers and obstacles even in situations where those dangers and obstacles, from the perspective of a more neutral observer, might seem grossly exaggerated. Because they are so willing to expend considerable cognitive resources, including the willingness to maintain vigilance and to think at length about other's intentions, motives, and plans, such people might detect patterns of threat that others fail to see. By maintaining a heightened, even if exaggerated, sensitivity to interpersonal dangers that surround them, paranoid perceivers maintain their alertness and focus. As Lewis and Weigert (1985) noted, distrust and suspicion help reduce complexity and uncertainty in organizational life by "dictating a course of action based on suspicion, monitoring, and activation of institutional safeguards" (p. 969). As former Intel CEO Andrew Grove (1996) liked to remind his executives, "Only the paranoid survive."

REFERENCES AND FURTHER READINGS

Baumeister, R. F. (1991). *Meanings of life*. New York: Guilford Press.

Boyle, R., & Bonacich, P. (1970). The development of trust and mistrust in mixed-motives games. *Sociometry*, *33*, 123–139.

- Colby, K. M. (1975). *Artificial paranoia: A computer simulation of paranoid processes*. New York: Pergamon Press.
- Colby, K. M. (1981). Modeling a paranoid mind. *The Behavioral and Brain Sciences*, 4, 515–560.
- Deutsch, M. (1973). *The resolution of conflict*. New Haven, CT: Yale University Press.
- Deutsch, M. (1986). The malignant (spiral) process of hostile interaction. In R. K. White (Ed.), *Psychology and the prevention of nuclear war* (pp. 79–103). New York: New York University Press.
- Fein, S. (1996). Effects of suspicion on attributional thinking and the correspondence bias. *Journal of Personality and Social Psychology*, 70, 1164–1184.
- Fein, S., & Hilton, J. L. (1994). Judging others in the shadow of suspicion. *Motivation and Emotion*, 18, 167–198.
- Fenigstein, A. (1979). Self-consciousness, self-attention, and social interaction. *Journal of Personality and Social Psychology*, *37*, 75–86.
- Fenigstein, A. (1984). Self-consciousness and self as target. *Journal of Personality and Social Psychology*, 47, 860–870.
- Fenigstein, A., & Vanable, P. A. (1992). Paranoia and self-consciousness. *Journal of Personality and Social Psychology*, 62, 129–138.
- Fine, G., & Holyfield, L. (1996). Secrecy, trust, and dangerous leisure: Generating group cohesion in voluntary organizations. *Social Psychology Quarterly*, 59, 22–38.
- Fox, A. (1974). *Beyond contract: Power and trust relations*. London: Faber & Faber.
- Gilovich, T. (1991). How we know what isn't so: The fallibility of human reason in everyday life. New York: Free Press.
- Govier, T. (1993). An epistemology of trust. *International Journal* of Moral and Social Studies, 8, 155–174.
- Grove, A. (1996). Only the paranoid survive: How to survive the crisis points that challenge every career. New York: Doubleday.
- Hardin, R. (2004). Distrust. New York: Russell Sage Foundation.
- Hilton, J. L., Fein, S., & Miller, D. T. (1993). Suspicion and dispositional inference. *Personality and Social Psychology Bulletin*, 19, 501–512.
- Kanter, R. (1977a). Men and women of the corporation. New York: Basic Books.
- Kanter, R. (1977b). Some effects of proportions on group life: Skewed sex rations and responses to token women. *American Journal of Sociology*, 82, 965–990.

- Kramer, R. M. (1991). Intergroup relations and organizational dilemmas: The role of categorization processes. In L. L. Cummings & B. M. Staw (Eds.), *Research in organizational behavior* (Vol. 13, pp. 191–227). Greenwich, CT: JAI Press.
- Kramer, R. M. (1994). The sinister attribution error: Origins and consequences of collective paranoia. *Motivation and Emotion*, 18, 199–230.
- Kramer, R. M. (1995a). In dubious battle: Heightened accountability, dysphoric cognition, and self-defeating bargaining behavior. In R. M. Kramer & D. M. Messick (Eds.), Negotiation in its social context (pp. 95–120). Thousand Oaks, CA: Sage Publications.
- Kramer, R. M. (1995b). Power, paranoia, and distrust in organizations: The distorted view from the top. *Research on negotiation in organizations*, 5, 119–154.
- Kramer, R. M. (1996). Paranoia, distrust and suspicion within social groups: A social categorization perspective. *Advances in group process*, *13*, 1–32.
- Lewis, J. D., & Weigert, A. (1985). Trust as a social reality. *Social Forces*, 63, 967–985.
- Lord, C. G., & Saenz, D. S. (1985). Memory deficits and memory surfeits: Differential cognitive consequences of tokenism for tokens and observers. *Journal of Personality and Social Psychology*, 49, 918–926.
- Salancik, G. R., & Pfeffer, J. (1978). A social information processing approach to job attitudes and task design. *Administrative Science Quarterly*, 23, 224–253.
- Siegel, R. K. (1994). Whispers: The voices of paranoia. New York: Crown.
- Stephan, W. G., & Stephan, C. W. (1985). Intergroup anxiety. *Journal of Social Issues*, 41, 157–175.
- Taylor, S. E. (1981). A categorization approach to stereotyping. In D. L. Hamilton (Ed.), Cognitive processes in stereotyping and intergroup behavior (pp. 83–114). Hillsdale, NJ: Erlbaum.
- Turner, J. (1987). Rediscovering the social group: A self-categorization theory. Oxford, UK: Basil Blackwell.
- Tyler, T. R. (1993). The social psychology of authority. In J. K. Murnighan (Ed.), Social psychology in organizations: Advances in theory and practice (pp. 141–160). Englewood Cliffs, NJ: Prentice-Hall.

New Approaches for Cultivating and Nourishing Communications Networks

GEORGE B. GRAEN

University of Illinois, Champaign-Urbana (Emeritus)

ew approaches for cultivating and nourishing communications networks take a more human interaction approach to the effective transmission of needed knowledge than do traditional approaches. New approaches emphasize the building and maintenance of what is called leadership sharing (LS) communications networks, whereas traditional approaches emphasized noise and other transmission distorting factors. The following quote from a communication practitioner makes our point.

In business and innovation, communications have one primary, overriding purpose-to build relationships. Not to inform or persuade, not to plan or contract, not to document or account, not to direct or report, not to buy or sell, but to build lasting relationships. Hard to accept, isn't it. That means that product brochures are not really about products. Business plans not about businesses. Project reviews not about projects. Sales calls not about sales. (G. Lunquest, personal communication, August 7, 2007)

Most employers of college graduates look for at least two critical skills in new hires—communications and dependability. Unfortunately, some of the more technically competent in terms of grade point average (GPA) are passed over because of a weakness in either of these two critical skills. In addition and equally important, this chapter is about how a college student with an average GPA can become a person who employers will hire for the better jobs. This chapter is about both communications and dependability in an organization. It goes beyond the

fundamental skills of speaking, writing, and informational technology to constructing and maintaining high-speed, ego-based communications networks from your first job until retirement. Graen and Graen (2007) and their colleagues have shown that the proper communication networks are contributors to both job and career success and to overall team effectiveness. But what are the proper networks? Before we discuss this key question, let us put together a straightforward framework for conceptualizing communications networks.

COMMUNICATIONS FRAMEWORK

Human organizational communications are messages sent and received containing both information and tone. A base communication requires a sender, a communications link, and a receiver. Lacking any one of these three components is not complete communications. As shown in Figure 74.1, communications within and between organizational members are divided into those formally specified often in writing and those that informally emerge through human interaction about the work of the organization (unwritten). Furthermore, both formal and informal communications can be divided into instrumental and expressive. Instrumental refers to doing some work and expressive means to add a personal touch. For our purposes, this is detailed enough for the formal, but we shall precede one division more for the informal. The informal instrumental and expressive can be divided further into offers or requests for

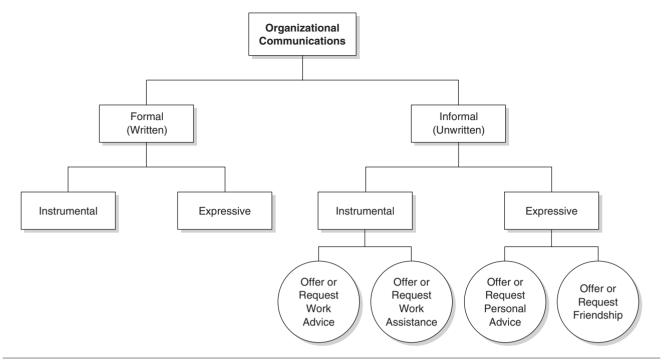


Figure 74.1 Communications Framework

work advice, for work assistance, for advice on personal problems, and for friendship. At this point, communications can create reputations and relationships of dependability. Those individuals who understand how to develop an authentic and trustworthy collegial relationship can use informal instrumental communications to offer and request both work assistance and work advice. In contrast, most individuals can offer or request both personal advice and friendship. We will focus this chapter first on the two instrumental activities. Before we do this, we need to discuss communications networks.

Networks

In organizations, 85% of all researched decisions involve getting advice from other people rather than searching relevant databases (Doz, Santos, & Wilkamson, 2001). For this reason, networks are constructed carefully one link at a time in an organization involving a sender, a link, and a receiver. Beginning with the first day on the job network opportunities emerge. Only the foolish new employees would commit to any network until they understand the nature of the various networks. Membership in some networks may be detrimental to one's career by aligning one with a discredited network. Before any link is forged with a colleague, the wise new employee assesses the attached network for hidden costs and if an error is made, it can be pruned quickly.

As shown in Figure 74.2, an ego network represents the focal person and those people who are directly connected in the network of communications. An extended ego network includes all those people who are connected to the

ego by at least two lengths. In the example, Mike is linked to the leader via the link with Marcus (two links) and the leader, Marty, and Marcus represent a triad. Note that no links directly connect Mike with Marty, connect the two with Jessie, or connects Jessie, Marty, Mike, or Marcus. These missing links are called network holes. The leader and Marcus are most central with the most links and Jessie and Mike are isolates with only one link to the core. These networks can be analyzed easily by available computer programs (Krackhardt & Hanson, 1993). Thus, employee's managers and executives must learn to think in terms of networks of different kinds and the overlap between and among them (Gibbons & Grover, 2006).

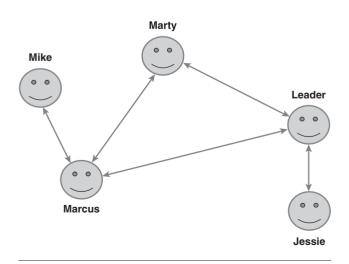


Figure 74.2 Dyads, Triads, Indirect Relationships

Leadership Sharing Networks

Now that we understand how networks are described in terms of links or relationships, we shall focus on the critical informal instrumental communication links. These links may become the web that leads into competence networks. A competence network is an informal communications network of people who get the impossible done and who keep the organization functioning. It is comprised of real doers who know how to successfully bypass formal dead ends and accomplish things in extraorganizational manners. These networks are difficult to join because new candidates must prove themselves worthy under fire, and the tests are unannounced and often unfair.

Competence networks are constructed from informal, instrumental communications links by sharing leadership on a project or a job problem. This is begun by offering or requesting work assistance or work advice of a colleague and his or her acceptance. Such offers or requests may grow into a shared leadership relationship over repeated exchanges through offering work assistance or advice on a job problem to a colleague and having it accepted and their reciprocating your kindness. This informally accepted interdependence usually starts with specific small problems and can successively grow to include much larger activities. As the exchanges become increasingly more complex, mutual respect and trust expand until the transformation of the exchanges from mutually instrumental to mutually expressive. At this point, the LS is between close friends. Such relationships once established may last over the entire lives of the two people.

At the extreme of this process are networks of dyads (two-person links) that depend on each other for their very lives such as surgical teams, soldiers, fire rescue workers, and police. These jobs put people in harm's way and LS at the highest level is demanded. Below this are highly competitive units of organizations in turbulent environments.

Lower still are the situations of career cooperation and competition in our life. Below this are professional sports. We are educated to the fact that our careers are a series of progressively more difficult competitions with our peers and yet we must cooperate with them. The answer to this conundrum is that we cooperate within our LS networks and compete with our peers outside them. Our studies of entire careers of college graduates who joined the same large, multinational corporation in 1972 and retired in 2002 showed that those who most effectively practiced LS networking were most successful throughout their careers in terms of speed of promotion and compensation (Graen, Dharwadkar, Grewal, & Wakabayashi, 2006).

LS should begin with the most significant others to an employee and this usually includes the direct report (supervisor). It should proceed to the next most significant other and then the next and so on. Periodically new relationships will be added as

needed until one's leadership networks cover all relevant functions inside and outside the employing organization. One way to look at your LS networks is that these people will help you when you need them most. Those outside of your networks likely will turn you and your problems away with "sorry, that's not my job," but those inside will assure you that "your problem is my problem, and we'll get it solved somehow."

In this way, LS relationships in which the parties agree to share who leads and who follows on various parts of projects augment the power of the formal organization to get things done. In these LS exchanges, who leads and who follows to support frequently are based on who has needed appropriate skills, information, and influence resources. In these networks, all get to lead some of the time. A network of these is called leadership sharing networks. These networks are the keys to understanding emergent events because when organizations are faced with new opportunities, whether positive or negative, the relevant LS networks are activated to cope. These networks, once activated, can be monitored to identify and map the organization's reaction. The wise employee can enhance his or her career progress by identifying, monitoring, and joining local networks.

The earliest links will be with a new employee's direct supervisor, unit peers, and those whose work is interdependent. Choices of links must be made quickly, but the offers should be carefully assessed for the long term. How can a new employee make such career relevant decisions quickly? Following are some things that may help.

Supervisor Strategies

Supervisor can be categorized into three strategies for communication relationship development and employees reporting to supervisors can be categorized into three categories according to the Graen and Graen (2007) as shown in Figure 74.3. Supervisor's strategies for LS communica-

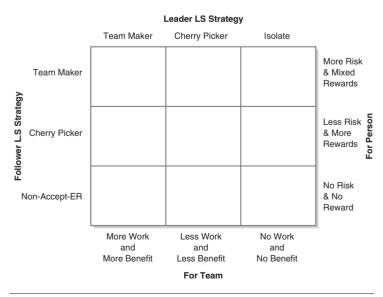


Figure 74.3 Leadership Sharing Strategies of Leader and Follower

242 • ORGANIZATIONAL BEHAVIOR

tions relations with his or her team are (a) team maker, who makes initial offers to all team members; (b) cherry picker, who makes offers only to the chosen few; and (c) isolate, who makes no offer to any team member. The first strategy is the most work for both the supervisor and the team members who accept. The second strategy is less work but returns less benefit. Finally, the no-offer strategy is no work and no benefits. In contrast, when the supervisor focuses on his or her nonteam members in the organization, the strategy of choice may be different. For many situations the supervisor should use strategy a for the team and strategy b for outside the team, because we find supervisors should be seen as fair beyond a doubt with his or her team but selective outside the team (Graen, Hui, & Taylor, 2006).

Follower's Strategies

Employees who report directly to a supervisor should make offers to selective people including the supervisor and use the cherry picker strategy. The shotgun strategy of offering to all is to risk in that poor choices of network members have negative consequences on better choices. Therefore, the cherry picker strategy implies that one picks carefully based on respect of capabilities and trust in dependability. Those colleagues who do not pass the tests at any point are dropped from one's network. Clearly, the process needs to be discussed and should not be attempted by the nonserious employee. Next, we turn to some dos and don'ts. Some dos and don'ts for the newcomers are as follows:

- 1. Do join the correct LS networks as soon as feasible and choose wisely.
- 2. Don't join the wrong LS networks, because some links can be poison to your effectiveness.
- 3. Do commit to chosen LS network links until proven faulty and then cut ties quickly and publicly.
- 4. Do nurture valuable LS network links to grow them to maturity.
- 5. Do maintain mature links by paying dues regularly.
- 6. Don't forget to forge triads and teams within your networks.
- 7. Do grow ever larger and more diverse LS networks inside and outside of your organization.
- 8. Do understand that LS networks keep the entire organization functioning and they change over time.
- Don't forget that this is a well researched communications theory, but it must be applied carefully and everyone makes mistakes.

Bottom Line

The research is clear that people use other people much more than databases for making decisions at work and the people with whom they consult are key member of the LS network. Why should this be the case? Databases supply more valid facts than experts, but they cannot make the necessary value judgments to back up a critical decision in a turbulent situation.

In addition to decision support, your LS network can supply other valuable resources such as

- 1. helping hands from others on your job problems;
- 2. inside information about the organization;
- 3. influence beyond your job;
- 4. latitude in your use of resources;
- 5. access to other's resources;
- 6. opportunities to make a difference; and
- 7. support by others.

WHAT OTHERS SEEK OF YOU AND WHAT YOU SHOULD SEEK OF OTHERS

We asked over 1,000 managers in five leading manufacturing companies how they attempted to demonstrate their LS potential to select their colleagues (Graen, 1989, 2007). The following 13 actions distinguished between effective employees and others:

- 1. demonstrate initiative to get things moving (self-starter);
- 2. attempt to exercise leadership to make the things more effective (show the way);
- 3. show a willingness to take risks to accomplish assignments (be bold);
- 4. strive to add to the value of assignments (go beyond);
- 5. actively seek out new assignments for self-improvement (volunteer);
- 6. persist on a valuable project after others give up (stay the course);
- 7. build elaborate LS networks to extend capability (push the envelope);
- 8. influence others by doing something extra (set an example);
- 9. deal constructively to resolve ambiguity (think it out);
- 10. seek wider exposure to people outside the home division (get outside);
- 11. apply technical training on the job, and build on that training to develop broader expertise (stay current);
- work to build and maintain a close working relationship with the immediate supervisor and colleagues (seek LS links); and
- 13. work to get the members of the LS networks promoted (boost your network members).

The following examples illustrate how each of these actions enabled these followers to become key players.

Demonstrate Initiative

By demonstrating initiative, followers make their bosses and colleagues aware that they are eager to outgrow their jobs. For example, they may demonstrate initiative by identifying problem areas in their jobs and then acting to correct the problems. Thus, when you see a problem with a customer order and handle the problem the way you have seen your manager handle it before (even though this is not part of your job description), you are indicating to your boss that you are capable of and willing to take on added responsibilities.

Exercise Leadership

An important characteristic of key players is that they are able to exercise leadership when necessary. You show this by helping your colleagues perform their jobs more efficiently and by providing direction when they are not certain as to the best method to use. In addition, you attempt to exercise leadership by offering to take charge of special projects such as interdepartmental task forces, which will help to develop your LS network.

Take Risks

The need to take risks increases as you reach higher levels in the organization. Similarly, those managers who are going to be successful in the organization are willing to take calculated risks in their dealings with their boss and colleagues. One way managers may do this is by communicating to their superior's and colleagues' hidden problems in the work process or soliciting advice or added resources as needed even though pressure in the work group dictates that this is not done. Similarly, they may take risks by supporting issues that they believe are correct, even though others in the work unit may not support the issue. In addition, they are not afraid to talk about their mistakes. Rather, they use past follies to their advantage by indicating to others what they have learned from their mistakes.

Add Value

They are constantly looking for opportunities to grow in their jobs. They find that one of the best ways to do this is to make their work more challenging and meaningful. For example, in his job as a supervisor of a market research department, Bill Atsuta found that unless he added value to his work, his job became boring and repetitious and did not allow him to develop his skills. Thus, rather than just monitoring the performance of the telephone interviewers, as his job description suggested, he added value to his job by offering his managers input as to how interviews could be conducted more effectively, and he wrote unsolicited

reports to those network members in charge of the development of the interviews that identified problem areas and made suggestions for improvement. Because of his extra effort, Bill found himself promoted to department head and on his way to the fast track.

Self-Improvement Assignment

Rather than waiting for others to offer them opportunities, they seek opportunities on their own to make the most out of not only their jobs but also themselves. Thus, they look for opportunities that will allow them to develop their skills and to grow on the job. They may request special training or take on assignments that require them to use new skills. They may also ask others in their networks to indicate their strengths and weaknesses so that they may improve in their areas of weakness.

Persist on a Project

If an assignment appears to be going nowhere, pause a moment in order to ask your network to help you to view the assignment in a new way. If even this strategy leads to failure, which in some cases it does, assess the situation to find out what went wrong and use the mistake as an opportunity for learning. Perhaps most important, learn never to make the same mistake twice.

Build Networks

Getting ahead means making as many strong contacts in your field as possible—in particular, contacts with those in competence networks. Find out what is going on in the organization and who is responsible for getting work problems solved. Then, initiate relationships with these people, which involved helping them or providing them with information that would help them in their positions. By building credits with the people in this network, you are thus able to obtain resources and accomplish things that would not have been possible without the help of others.

Influence Others

Influencing others is not as easy as it may appear. It involves building credibility, as well as adjusting your interpersonal style to match those of others. As you build your LS networks, you learn to be authentic even when it hurts.

Resolve Ambiguity

One of the most difficult problems for employees and managers in organizations is learning how to deal with ambiguity because ambiguity characterizes many of the difficult situations people face in the work place. Frequently, it is unclear what is not working, why it is not working, or what is needed in order to make things work. Also, people in the workplace may present ambiguous requests

or offer ambiguous rationales. Those people who learn how to handle these ambiguous situations most effectively find themselves on the fast track. When you find yourself working with a boss who is always very ambiguous in his requests, take several steps to deal with the ambiguity rather than simply becoming frustrated and not completing the assignments. Perhaps most importantly, take the initiative to gather as much information and assistance as possible from your network of supervisors, peers, and others. When necessary, make educated assumptions that allow you to continue the task. Throughout the process, approach your network for brief feedback on whether you are performing the assignment properly. By using your network knowledge and best judgment, complete ambiguous tasks while requiring very little of your supervisor's time.

Seek Wider Exposure

Because information is such a powerful resource in organizations, employees who aspire to get ahead actively seek ways to gather more information through forming networks. One way to do this is by associating with people outside the home division. By interacting with outside managers, you gain a better understanding of your organization and its operations, as well as of the different problems faced by members of other departments.

Build on Existing Skills

When new employees enter organizations, they have a certain amount of knowledge and technical skills that make them desirable to the organization. Often, however, this technical training is limited, and within a relatively short period, it may become obsolete. Thus, managers must continually work to keep their technical skills current through interactions within their networks.

Develop a Good Working Relationship With Your Boss and Other Network Members

One of the most powerful influences in your career progress is your immediate boss. Your boss controls the types of opportunities and resources as well as the types of rewards that you will receive from the organization. It is vital that you strive to develop the best working relationships possible with your boss and other network members.

Promote Your Boss and Network Members

One of the best ways to get accepted to the LS network may be to work toward promoting your boss and your network members: do your job the best you can so that you help make them look good. Then, when they advance through the organization, they may help you along.

All of these activities require employees to grow out of the narrow confines of their job by constructing a network, which provides opportunities to assume greater personal responsibility by taking larger risks and by growing more quickly professionally. Those upstairs will notice these activities and make a difference to your career. Participation in these activities communicates readiness for network investment. Once noticed as a person with a powerful network, you become a candidate for investment and additional opportunities to show your stuff likely will be forthcoming (see Graen, 2007 for useful methods).

GETTING PICKED

Before you can hope to establish a LS link with another, you must pass his or her entrance test and convince him or her that you can be trusted to deliver on your promises and that you have something of value to offer. Convincing your potential partner of the former is more difficult than the latter; however, both require some thought. Even a great "pickup" line only gets momentary attention. Then, you must follow through with your proof.

Some people believe that people trust you or do not trust you based on rumors about you. True, some basis for trust can be found in this way, although it is too unreliable. This is open to stereotyping and biases. What is recommended is a more direct approach called the "growth need interview." This interview is designed to suggest to others that you are interested in furthering your career by describing your interests and ambitions. This attempt to show your growth needs as an individual can go a long way toward passing the entrance test. Through such conversations, which may stretch out over several weeks, you tell your selected others what you want now and what you hope for in long term. Also, you ask your selected others to share the same information with you. It may be uncomfortable at first, but it becomes routine after a conversation.

After this interview, the next step is to achieve an initial challenge to begin growing out of one's job in the form of some small request that is somewhat outside of the selected other's expectations. This offer should make clear that this request is authentic and requires no exchange of like kind. If you require special information or other resources, ask for them. In addition, if you get into trouble, your colleague will be obliged to help you out. Once the request is fulfilled, you should receive your colleague's thanks. The early "grabber" rewards are material and the later "sustaining" rewards are more social and self-fulfilling.

Graen (2006) and his associates (Graen, Hui, & Taylor, 2006) have developed a measure that taps into the magnitude of sharing leadership expectation (SLX) with six sensitive questions you ask yourself about each and every member of your personal network at work. The higher your score when you are brutally honest the greater your chance of developing a shared leadership relation. Start with your immediate supervisor; next, do each of those who report to you; and continue with all those people who depend on you

or who you depend at work. For each of the six questions, the responses are strongly disagree (1), disagree (2), don't know (3), agree (4), and strongly agree (5). The six questions are as follows.

- a. Is my (colleague, supervisor, or subordinate) satisfied with my work?
- b. Would my (colleague, supervisor, or subordinate) help me with my job problem?
- c. Does my (colleague, supervisor, or subordinate) have confidence in my ideas?
- d. Does my (colleague, supervisor, or subordinate) have trust that I would carry my workload?
- e. Does my (colleague, supervisor, or subordinate) have respect for my capabilities?
- f. Do I have an excellent working relationship with my (colleague, supervisor, or subordinate)?

When you add your six scores, the range of scores is 6 to 36, and the higher your score is, the greater your chance of developing a LS link is. If your score with, say, your supervisor is low (24 or below), you should act quickly to correct this unfavorable situation. Clearly, the six questions should help you identify the areas that need your immediate attention. When you first start your job, your score should be about 24, because you do not know about any of the six areas. Test yourself at appropriate intervals and act to improve the problem areas. You have these tools to help you in your quest to become a key communicator in your organization and make a difference.

If you pass this initial test, you seek another larger project. After a few of these exchanges, your selected colleague will begin to trust your promises. But never make a promise that you cannot keep. When your selected colleague offers the challenges, seek more and explain the developmental process in terms of mutual benefit. If your other demurs, keep working until all hope is lost. If you reject your leader's offers, they will cease being offered.

You cannot rightly complain after you reject an offer, so be careful. You may opt back into the process later when they see the growth and achievements of your peers who completed the process from the first offer.

Though these informal episodes of seeking and achieving appropriate challenges based on current work flows and the developing needs, getting support for your projects, and rewards after the projects are completed, mutual trust, respect, and commitment grow. Over this process, the challenging projects become more responsible and the corresponding

rewards become more significant. The process of building LS networks flows smoothly once the initial tests are passed and both parties continue to construct ever-stronger bonds of mutual trust, respect, and commitment.

Our research investigations have shown that leaders and followers who complete this process gain the advantages of performance beyond expectations, satisfaction with their jobs and their careers, mutual trust, respect, commitment, and optimism about the future. Over their careers, they consistently develop these agreements with their leaders, followers, and peers as they move up the hierarchy of their companies until they find their dream job. Finally, they move up higher and faster than their peers do over their careers and arrive home earlier.

WHAT IS THE ADVANTAGE?

From a network member's viewpoint, because a potential partner grows from a supporter to a partner through the process, he or she and the focal person have created strategic human assets (Uhl-Bien, Graen, & Scandura, 2000). When one partner has a problem that he or she cannot solve, the other partner will help even though it may cost him or her personally or professionally. As one network member goes beyond his or her job, the other reciprocates in kind. All parties share information openly and honestly, even when it may be painful. Both create their own network language based upon shared experiences (Fairhurst, 1993). This language allows one member to talk to the other in their coded language in the presence of others without their comprehending.

CONTINGENT COMMUNICATIONS STRATEGIES

Strategies for different structural locations in the formal organization require different strategies to develop LS communication relations. As shown in Figure 74.4, vertical

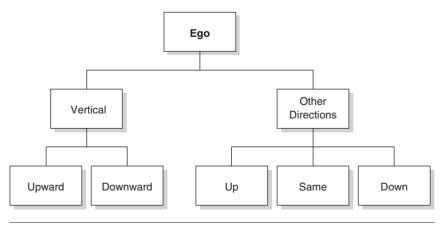


Figure 74.4 Communications Strategies

(or direct authority flows) relations should have different strategies than other (or no direct authority flows) relations. This is due to the complications that one party has superior control of the other's formal organizational outcomes such as promotion and dismissals. Clearly, career outcomes are influenced by one's superior. This should be divided further into upward and downward, because upward is constrained by concerns for showing respect for the office, being seen authentic and career outcome concerns and downward is constrained by concerns about being seen as fair to all group members and achieving group goals.

In situations where the other potential communications relations have no direct authority flows to the ego, different strategies should be applied for those above the ego's level (upward), those at the same level (same), and those below (downward). The differences in strategies among those three directions on the organization's chart differ contingent upon slightly different constraints on actions of ego. Upward is constrained by the needs to be seen as both respectful of the superior status, authentic as a person, and not be seen as going over someone's head. At the same level, ego's communications strategy is constrained by the need to balance cooperation with career competition. Finally, downward relations are constrained by respect of formal communications and authority flows and the need not to be seen as going behind someone's back.

OVERCOMING FEARS

With all of these benefits of LS, why do so many leaders of creative teams fail to engage the process fully? As was described by Kramer (2006), one communication strategy to initiate team LS is for the leader to admit that he or she does not have all of the answers and ask for suggestions from team members. Those who readily offer suggestions are encouraged and recognized for good ideas but are protected from criticism for poor ideas. Those team members who resist offering suggestions can be asked again and again. This process is self-correcting as the team will help sort out the more useful from the less useful ideas when given the opportunity. One question that arises from this is what factors inhibit the easy acceptance of this promising method of building a creative team of LS teammates.

We find that managers we have trained to become leaders usually have several doubts about entering a process of LS. First, they fear a loss of control by giving team members too much latitude in decision making and coordination of the team may become too difficult and make them look bad. Second, they fear that team members will ask for personal favors and create embarrassing obligations for leaders. Third, they fear that team members will find out that they do not have all of the answers and lose respect for them. Finally, although many more fears have been expressed, the last resort is that their teammates do not want to share leadership with them. These fears must be addressed and worked through before leaders will test the unknown of LS.

Fortunately, these fears can be overcome with proper training in the strategies of LS. Trainees come to understand that the process of sharing leadership is a successive approximation process in which successively more significant opportunities are reinforced when successful with progressively more meaningful recognition and resources. Also, they learn that followers must be made to succeed especially early in the development.

As the process unfolds, followers who share leadership grow into leaders within the team and share equitably in the success of the team. They grow out of their old roles and into new roles within the team. They come to understand that team leadership can be multiplied by following appropriate strategies. Team leaders come to recognize that sharing too much leadership too soon is a strategic mistake. They learn that until a follower is prepared to respect and enact a LS opportunity, it should not be given. After they are given, opportunities need to be supported as necessary to ensure success, because success invigorates the growth of shared leadership. Clearly, the benefits outweigh the risks in building a creative LS team. Even when a leader develops only one member into a LS partner, the benefits are worth the effort.

RESEARCH FINDINGS

New approaches for cultivating and nourishing communications have highlighted a number of generalizations about organizational behavior.

Most of communication behavior of humans in organizations is overdetermined by the rules and procedures of the formal organization enforced by legal contracts and agreements. That being stated, the most interesting and beneficial behavior is underdetermined and is called informal communication. Both are necessary for an organization's survival. Informal organization is governed by the nature of humans as self-aware, need satisfying, social creatures with limited rationality, imperfect information, creative imaginations, and deep-seated hopes and fears.

Informal communications can be mapped in terms of networks of expertise, information, influence, and social capital at any point in time and over time in terms of flows sensing relevant events, sense making, and implementation throughout the organization and its environments. As Orton and Dhillon (2006) described the flows of strategy, formulation goes from microactions (low levels) to mesooptions (middle levels) to macrostrategy (top levels of organization) for the purpose of continuously improving the organization's future. One key to this mapping process is the rigorous measurement of relationships between formal and informal influences on individual, team, and network flows of behavior.

Informal communication relations are granted between employees in exchange and in proportion for shared leadership. Thus, for a person to grow his or her leadership influence to get the right things done the right way with others,

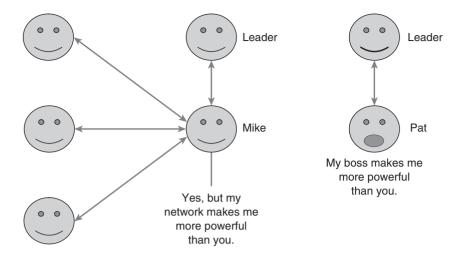


Figure 74.5 It Takes a Network

he or she must find a way to share leadership with those ready and willing to invest it properly. As shown in Figure 74.5, people who understand this multiplier effect are those who are most successful over their entire careers.

Those who understand that LS among members creates social capital throughout networks should encourage their associates and followers to do so for the good of their organization and their careers.

They can destroy their social capital if they are not careful. Those who understand this and respect their followers will benefit from social capital.

Those who successfully grow influence in their networks also agree that those in their networks can in turn influence them.

Certain people in organizations can form a competence network for a focal person. This is an influence network made up of people with abundant social capital who get "impossible" things done in bureaucracies (Graen, 1989 & 2007).

We support the marriage of communications theory and network analysis theory and hope that the new theory of LS in teams and networks is a step in that direction. We expected the goal to be reached soon after our early research showed that one's leader's relationship with his or her boss limited the influence and social capital of a focal person (G. B. Graen, Cashman, Ginsburg, & Schiemann, 1977). The communications network up the chain of command made a difference for lower participants.

The impact of what a leader says to his or her follower depends on the particular LS link between the two (Wang, Law, Hackett, Wang, & Chen, 2004). A leader may use any of a number of transformation leadership styles, but the proof of the pudding is in the critical sharing of leadership. We should not be fooled by the ease of training leaders to talk the transformation talk to followers and forget about the critical process of using authentic LS to grow leadership and other social capital (Bass & Avolio, 1997). Clearly, it does not matter what the leader says about vision, if

followers do not really listen and buy in. We need to let one million flowers bloom to understand more authentic leadership.

RECOMMENDATIONS

As we enter the information age, communications becomes even more critical to effectiveness of individual, dyads, triads, teams, silos, organizations, industries, and so on. Communications relations both motivate and direct activities at all levels in our increasingly turbulent environments. Those networks that supply the needed information and resources will determine the future of people and their organizations in the 21st century.

For those who aspire to make a difference for their maker and share in the success of modern organizations in this information age, we recommend that they do their homework and cultivate and nourish their communication networks. Herein lies the key to success for those who choose wisely.

REFERENCES AND FURTHER READINGS

Bass, B. M., & Avolio, B. J. (1997). Full range leadership development: Manual for the multifactor leadership questionnaire. Palo Alto, CA: Mind Garden.

Degenne, A., & Forse, M. (1999). Introducing social networks. London: Sage.

Doz, Y., Santos, J., & Williamson, P. (2001). From global to metanational. Boston: Harvard Business School Press.

Fairhurst, G. T. (1993). The leader-member exchange patterns of women leaders in industry: A discourse analysis. *Communication Monographs*, 60, 312–351.

Gibbons, D. E., & Grover, S. L. (2006). Network factors in leader-member relationships. In G. B. Graen (Ed.), *Sharing network leadership, LMX leadership: The series* (Vol. 4, pp. 63–93). Greenwich, CT: Information Age.

Graen, G. B. (1989). *Unwritten rules for your career: 15 secrets for fast-track success*. New York: John Wiley & Sons.

- Graen, G. B. (2006). Post Simon, March, Weick, and Graen. In G. B. Graen (Ed.), Sharing network leadership, LMX leadership: The series (Vol. 4, pp. 269–278). Greenwich, CT: Information Age.
- Graen, G. B. (2007). *Jessica's web*. Charlotte, NC: Information Age.
- Graen, G. B., Cashman, J. F., Ginsburg, S., & Schiemann, W. (1977). Effects of linking-pin on the quality of working life of lower participants. *Administrative Science Quarterly*, 22, 491–504.
- Graen, G. B., Dharwadkar, R., Grewal, R., & Wakabayashi, M. (2006). Japanese career progress over the long haul: An empirical examination. *Journal of International Business Studies*, *37*, 148–161.
- Graen, G. B., & Graen, J. A. (2007). *New multinational leadership sharing*, *LMX leadership: The series* (Vol. 4). Charlotte, NC: Information Age.
- Graen, G., B., Hui, C. & Taylor, E. A. (2006) Experience-based learning about LMX leadership and fairness in project teams: A dyadic directional approach. *Academy of Management Learning and Education*, 5(4), 448–460.
- Krackhardt, D., & Hanson, J. (1993, July/August). Informal networks: The company behind the chart. *Harvard Business Review*, 104–111.
- Kramer, M. W. (2006). Communication strategies for sharing leadership within a creative team: LMX in theater groups. In

- G. B. Graen & J. A. Graen (Eds.), *Sharing network leadership, LMX leadership: The series* (Vol. 4, pp. 1–24). Greenwich, CT: Information Age.
- Maxwell, J. C. (1993). *Developing the leader within you*. Nashville, TN: Thomas Nelson.
- Orton, J. D., & Dhillon, G. (2006). Macrostrategic, mesostrategic, and microstrategic leadership processes in loosely coupled networks. In G. B. Graen & J. A. Graen (Eds.), *Sharing network leadership, LMX leadership: The series* (Vol. 4, pp. 137–167). Greenwich, CT: Information Age.
- Seers, A. (2004). Interpersonal workplace theory at a crossroads. In G. B. Graen (Ed.), New frontiers of leadership, LMX leadership: The series (Vol. 2, pp. 1–31.). Greenwich, CT: Information Age.
- Uhl-Bien, M., Graen, G. B., & Scandura, T. A. (2000). Leader-member exchange (LMX) for strategic human resource management systems: Relationships as social capital for competitive advantage. Research in Personnel and Human Resources Management, 18, 137–185.
- Wang, H., Law, K. S., Hackett, R. D., Wang, D., & Chen, Z. X. (2004). Leader-member exchange as a mediator of the relationship between transformational leadership and followers' performance and organizational citizenship behavior. *Academy of Management Journal*, 48(3), 420–432.
- Weick, K. E. (1995). Sensemaking in organizations. Thousand Oaks, CA: Sage.

Intercultural Communication

Strategies for Managing Intercultural Dimensions of Business

HENDRICK SERRIE, NAVEEN K. MALHOTRA, STEVE SIZOO, AND MORRIS SHAPERO Eckerd College

very human group shares a body of common understandings, its culture, which serves to make communication within the group intelligible and which guides behavior and enables the group to achieve common objectives.

Common understandings, communication, and behaviors set each group apart from other groups. To a greater or lesser degree, there is overlap with the shared understandings of other groups. Nevertheless, critical points of difference in these understandings, however minor they may seem to outsiders, give rise to convictions of being a separate group and reinforce a shared identity.

While separate cultures may share varying amounts of their content, their points of difference establish boundaries. These cultural boundaries are potential obstacles to communication.

Communication is the act or process of imparting or exchanging meanings, such as information, opinions, thoughts, and feelings. Intercultural communication is the act or process of imparting or exchanging meanings across cultural boundaries. Anything that humans seek to transmit from one individual or group to another within a specific culture

(intracultural communication) may also be transmitted between different cultures (intercultural communication).

INTERCULTURAL MISCOMMUNICATION

Intercultural miscommunication occurs when intended meanings are unclearly, inadequately, or mistakenly communicated across cultural boundaries. All human behavior, including business behavior, is enacted within specific cultural contexts. When we are operating within our own native culture, we may take culture for granted. However, when we find ourselves within a culture different from our own we are operating culture blind. Whether we realize it or not, different rules of behavior may apply. Anything we do or say can unexpectedly, upsettingly, and sometimes destructively, explode in our faces. Such intercultural errors may negatively impact the situations in which we find ourselves.

There is growing understanding among businessmen and businesswomen at all levels of the importance of understanding foreign cultures and of the necessity of business individuals and business organizations to adapt their behaviors and operations to their host foreign cultures (Ferraro, 2006; Serrie, 1986; Terpstra & David, 1991).

Intercultural Errors and Business Individuals

Simply by behaving normally in our own cultural perspective, we may unwittingly commit intercultural errors. Intercultural errors follow a typical pattern:

- 1. *Innocuous Start:* The intercultural visitor (e.g., businessperson, government official, student, tourist) says or does something that would be considered entirely appropriate in the visitor's home culture.
- 2. *Inexplicable Response:* The intercultural host reacts in an unexpected way, such as stunned silence, embarrassed laughter, frosty or angry retort, abrupt departure, and sometimes even physical violence.
- 3. *Confusion:* The intercultural visitor is unaware or only vaguely aware of his of her error, or the visitor is shocked and confused. (Brislin, Cushner, Cherrie, & Yong, 1986)

Culture Shock and the Ugly Foreigner

Residence in a country or region with a culture significantly different from our own can be an intensely rewarding experience, or it can result in varying degrees of misery for ourselves and/or others in contact with us. We may ethnocentrically hurt ourselves and/or we may ethnocentrically hurt our host nationals. Mistakes may be innocuous, perhaps the subject of much humor at our expense. More seriously, intercultural mistakes may prove to be upsetting to the intercultural visitor and/or host nationals and may even seriously damage the capability of the business organization to carry out its operations.

Failure to successfully manage the cultural barriers, especially when we are on our own, can result in a form of psychological regression or breakdown known as *culture shock*. If we are with a group of Americans, this can serve to insulate us from our cultural errors, and the damage may accrue primarily to those foreign persons unfortunate enough to have interacted with us. A series of intercultural mistakes can build an image of the "Ugly Foreigner."

Intercultural Errors and Business Organizations

Not only do businesspersons commit intercultural mistakes as individuals, but their organizations do so as well (Ricks, 1993). When a business organization makes intercultural mistakes, it may result in costs to the company amounting to millions of dollars; and when a business organization hurts host individuals, organizations, and communities, it can seriously jeopardize its reputation and guest status in the host nation.

Europeans have understood this for centuries, in that even short trips of a hundred miles may bring a traveler to an entirely different nation and culture. Small nations that are highly dependent upon international trade are acutely aware of the need for intercultural knowledge and skills. For nations like Iceland, the Netherlands, or Japan, whose language is spoken in no other country, the need for linguistic as well as broader intercultural training is obvious. In the Netherlands, for example, instruction in not one but two foreign languages is required in the public schools, starting in the first grade and continuing through secondary school.

America, on the other hand, did not have to come to grips with cultural differences until the last few decades. Before World War II, the continental size of our country insured that internal trade dominated our economy; and, in the postwar years, America had little competition for its products in its growing international markets. Whatever intercultural errors Americans made in this period, and there undoubtedly were many, were usually accepted and swept under the carpet.

However, during the 1960s foreign products and labor became fierce competitors with American products and labor in price, quality, and advertising image, both at home and abroad. With many alternatives available to the rest of the world, and with rising movements of nationalism and ethnic identity everywhere, irritation with American intercultural ignorance and insensitivity was increasingly expressed.

Of necessity, the long era of American intercultural ignorance is rapidly coming to an end. Because intercultural understanding and skills enhance the competitive edge of any business product or activity, American business individuals and organizations are increasingly incorporating them into their daily operations and long-range strategies.

THE ANTHROPOLOGICAL CONCEPT OF CULTURE

Culture in the anthropological sense is the sum total of meanings and understandings, the learned patterns of ideation, communication, action, and materialization that constitute a way of living, built up over time by a group of human beings and transmitted from one generation to another. The nature of all culture is that it is learned, as opposed to genetically acquired like instinct, and the development of culture-creating abilities is a major feature of the biological evolution of hominids. As with instinct, the function of culture is to provide an adaptation to the environment.

The concept of culture has proven to be protean in its ability to morph into different shapes. The first anthropological definition of culture was crafted in the 19th century by E. B. Tylor (1871/1958), who wrote, "Culture or Civilization, taken in its wide ethnographic sense, is that complex whole which includes knowledge, belief, art, morals, law, custom, and any other capabilities and habits acquired by man as a member of society." Fifty years ago, two leading anthropologists compiled no less than 400 different definitions of culture. Each one was tailored to the theoretical orientations of the authors and served the purpose of such

diverse fields as archeology, linguistics, and psychology (Kroeber & Kluckhohn, 1952). One of today's popular anthropology textbooks defines culture as "a society's shared, socially transmitted ideas, values, and perceptions" (Haviland, Prins, Walrath, & McBride, 2007).

The Divisions of Culture

Culture is divided into several systems that are in complex ways and varying degrees interrelated:

Technology and materialization. This division comprises the knowledge and skills to effect changes in the material world, and the material results, including artifacts, of those changes. Technology is at the base of cultural organization and change. Technology and the natural environment determine or limit the types of economy available to any human group.

Economy and economic organization. This division comprises the forms of obtaining basic and nonbasic needs from the natural and social environments, such as food, clothing, shelter, transportation, communication, and entertainment. It includes the channels of production, distribution, and consumption.

Social organization and political organization. Technology and economy determine or limit the types of social and political organization available to any human group, from the family or domestic group through secondary organizations (e.g., lineage, clan, church, school) and up to the largest organizations of tribe, chiefdom, and state. This includes hunting-gathering bands and agribusinesses, shops and corporations, shamanic ceremonies and churches, war parties and armies, and councils and governments. It also includes the management knowledge and skills relevant to each organization.

Ideation. Technology, economy, and sociopolitical organization determine, limit, or influence the ideational systems of any human group, the bodies of thought and expression on such topics as the supernatural, politics, and everyday life, and include values, religion, ideology, and art forms.

Communication. This division comprises all the forms of communication, including gestures, spoken language, symbols, and writing. The vocabulary content (words, gestures, symbols) of communication makes reference to and summarizes the entire gamut of meanings of all the divisions of a culture. However, linguistic subsystems like phonology, morphology, and grammar are independent of other cultural systems.

Cultural Change

Because culture is learned, it is able to change rapidly in comparison with instinct. Through discovery and invention, trial and error, individuals generate innovations, some of which are adopted by other members of their own group and thus become part of the group's culture. New business products and services that meet needs are readily acquired by consumers. Moreover, useful or attractive elements of one culture can be adopted by any other culture and made its own.

Throughout history, trade has been one of the most important mechanisms of cultural diffusion. Today, the multinational corporation may well be the most powerful institution for cultural change in the world. Many of the products and services it sells are relatively new from the perspectives of traditional cultures in developing nations. Other products and services are absolutely new, even in industrial nations, in that they have been discovered or invented in the research and development programs of the multinational corporations themselves. Advertising and marketing activities carried on by multinational corporations motivate people to buy these products and services and often teach media audiences not only the technical, but also the social behaviors for using them.

Viewed holistically, the new material culture merchandised by multinational corporations around the world implies or requires changes in economic, social, and ideational culture as well. There are, moreover, not only the direct effects but indirect and unforeseen effects as well. With immense assets that dwarf the resources of many developing nations, the role and effect of a multinational corporation can be pervasive.

Because this process is constant, incremental changes inexorably push all nations into cultural transformation after transformation. While political interest groups prevent or retard needed cultural changes through governmental structures, the free market is quietly introducing revolutionary changes that have their own philosophy and direction. Much of the cultural content of the future, trivial and fundamental, for good and for evil, is in the hands of multinational corporations.

Linguistic Versus Technological Cultural Change

Whereas cultural development pushed by technology is following an exponential rate of change, linguistic (non-vocabulary) change is very slow. It took around 12 to 15 centuries of linguistic process for a parent language (e.g., Ancient Chinese and Latin), to separate into mutually unintelligible offspring languages (e.g., Mandarin, Wu, Cantonese, Min, Hakka, Hsiang; Italian, French, Spanish, Portuguese, Rumanian, Catalan, Provencal, Rhaeto-Romanic, Sardinian, Moldavian) (Katzner, 1986). Unlike technological change, which might be seen as progressive in that its developments lead to ever greater control over nature, linguistic change is not related to practical functions and is therefore not progressive.

Technology as the Prime Mover of Cultural Change

Technology undergirds most of culture. Starting with the very beginning of cultural evolution, archeologists label the prehistoric human periods in terms of increasingly sophisticated stoneworking technology (Paleolithic, Mesolithic, and Neolithic). The Neolithic Period saw the advent of

agriculture and permanent habitations. Some villages grew into cities, creating the civilizations of antiquity, which are characterized by specialization of labor, monolithic architecture, organized religion, standing armies, endemic warfare, and the development of writing. Increasingly sophisticated metallurgical technology (Copper, Bronze, and Iron Ages) distinguished categories of early civilization, and along with increasingly sophisticated management techniques, enabled the conquest by city-states of larger and larger empires (Harris, 1966).

COEXISTENT TECHNOLOGICAL LEVELS

None of the levels of technology observed in the archeological record have entirely disappeared among contemporary cultures. Mastery of fire, the great achievement of Homo erectus, remains a fundamental element of all present-day cultures. Remnants of Paleolithic hunting and gathering technology and material culture persist in remote and technologically primitive indigenous cultures found in many parts of the world, and specialized aspects are preserved as sport or art in wealthy nations (e.g., the bow and arrow, boomerang, and spear thrower or atlatl). In today's world, there are fundamental differences between cities and urban culture, rural villages in developing nations, and isolated indigenous peoples.

Cities: Carriers of the Modern Global Culture

Globalization is spreading the most essential of modern technology everywhere. There is no city in the entire world that does not have modern transportation and communication systems (e.g., motor vehicles, traffic signals), even if the local culture often finds colorful ways of designing and decorating busses, trucks, three-wheeled vehicles, and the like. Telephones, cellular phones, fax machines, and computers are everywhere. The technology of modern transportation and communication has revolutionized the speed and the scope of international business operations. Along with the material culture of the industrialized world, nonmaterial ideational culture has also spread globally. Modern technology has made international business operations not only easier, but also more culturally familiar and therefore predictable.

Cultural Universals and Cultural Alternatives. However, while modern technology and science comprise the cultural universals (i.e., found in all cultures), ideational culture has spread as a set of cultural alternatives (i.e., choices or options). Probably every city in the world has restaurants specializing in different national cuisines: Italian, French, Chinese, Japanese, Mexican, American fast food, and others share a peaceful coexistence. On the other hand, city cultures in the contemporary world are in many ways in conflict as different religious beliefs, social practices, and political ideologies collide and compete with each

other. Yet no nation rejects modern military hardware or modern high-rise construction techniques, and even terrorists hostile to modernization make full use of cell phones and the Internet

Peasant Villages: Between the Neolithic and the Postindustrial

There is a severe cultural division between the urban and rural sectors of the developing world. Almost half the population of the world, perhaps 3 billion people, live in rural agricultural villages. Anthropologists have used the term "peasants" to distinguish these preindustrial or partly industrial agriculturalists from the industrialized and computerized farmers of the developed world. Though sharing the same civilization as the urban centers with which they are in a symbiotic relationship, peasant villages are simple and modest and lack the cultural elaboration and sophistication of cities. Though some hinterland villages are caught up in some of the great world, regional, and national movements of cultural change, they nonetheless lag behind cities. Rural cultures are bound by their agricultural technology and economy, are limited by poverty and low levels of education, and are far more culturally traditional in their social groupings and folkways.

In many of the rural villages of developing nations, Neolithic stone technology coexists with the machinery and other products of industrialization. In Mexican villages, for example, the metate and mano stone table and roller used for grinding corn are commonplace. Throughout the world, Neolithic techniques of making pottery and weaving cloth coexist with contemporary ceramic and textile manufacturing processes. In China, modern silk production still depends upon the labor-intensive feeding of silkworms and the unraveling of their cocoons; little has changed since the Chinese Neolithic. Much of the plant cultivation in developing countries is still done by hand or with animal power. It is still common to see oxen with wooden yokes pulling wooden plows. Goats, camels, horses (Mongolia), and a large percentage of the cows in the world are still milked by hand. Beasts of burden continue to be ridden bareback or with saddles invented in ancient times.

Business people, economists, development officials, and political leaders have not been sufficiently aware of the economic importance of Third World rural peoples as consumers of capitalist products. Yet peasants have always purchased and used products of the industrial world that are useful (e.g., bicycles) or interesting (e.g., radios) and which they can afford. A few writers have documented the informal distribution channels of multinational products in the hinterlands of developing nations and have pointed out the potential for a much larger and lucrative peasant market (Prahalad, 2005; Serrie, 1991, 1994).

American businessmen dream of a Chinese market with over 1 billion customers, but over two thirds of that market reside in China's 1 million rural villages. Reaching Chinese villagers is a far greater intercultural challenge than reaching the residents of Shanghai or Guangzhou, and few Western businesspeople have the knowledge or skills to do it successfully. Intercultural training is imperative.

Indigenous Peoples: Aboriginal Isolation

Indigenous or aboriginal peoples are those known to be the original or earliest known inhabitants of a region or country. Every populated continent has indigenous peoples, including Eskimos in the North American Arctic, Yanomamo in the Amazon, Lapps in the European Arctic, Ainu in Japan, and Yir Yoront in Australia. They constitute remnants of those hunting-gathering, horticulturalist, and herding cultures existing before the arrival of agricultural and industrial civilizations.

Indigenous peoples are the most isolated of all human groups, typically occupying remnants of land unwanted by expanding agricultural or industrial cultures: mountains, deserts, tundra, jungles, and swamps. Yet this isolation is not absolute, and in modern times even indigenous peoples increasingly buy products of the industrial world, though on a greatly restricted basis, especially in comparison to the purchasing patterns of peasant peoples. Unlike peasant cultures, whose populations are in the millions in many developing nations, the populations of indigenous peoples are small, numbering in the hundreds, thousands or, rarely, in the tens of thousands. With relatively primitive technologies, the economic resources of indigenous hunting-gathering, horticultural, and herding peoples are meager in comparison with the resources of peasant peoples.

If cities and urban populations wield the most political power, and peasant populations much less, then isolated indigenous peoples have virtually no power at all; they are usually wards of the nations in which they are located. For these reasons, indigenous peoples usually do not constitute significant markets for multinational corporations. Significant exceptions occur, however, when valuable natural resources are discovered on indigenous lands, or when a nation's laws permit exceptions to gambling prohibitions.

INTERCULTURAL ADAPTATION

Both business organizations and business individuals must adapt to their host cultures (Ferraro, 2006; Serrie, 1986; Terpstra & David, 1991).

Adaptation of Business Operations to the Host Culture

Technology. In some nations, low levels of prior experience and familiarity with modern tools, appliances, machines, vehicles, and technical procedures may create difficulties with consumers in advertising a multinational

product, in using it safely, or in using it so that it will last as long as intended. There may be difficulties with employees not sufficiently versed in the technical skills needed in production, clerical tasks, sales, or management. Employees may have difficulty operating company machines and vehicles. Concepts of hygiene and of safety may be little understood, and the company may need to provide explicit training. The host language may not have adequate vocabulary for describing the company's product, identifying parts for assembly and servicing, or instructing in the use and repair of the product. The infrastructure of the host nation may be inadequate or different in critical ways.

Social groupings. In some nations, management style may be more authoritarian or less authoritarian than in the United States. It is not uncommon for decisions to be made higher in the chain of command than in the United States. so that one's counterpart does not have equivalent powers. Sometimes it is a group rather than an individual that bears responsibility for making decisions and meeting objectives, and competition between individuals is avoided. In many countries, companies are family owned, and family members or friends hold significant positions in management. Jobs, contracts, and orders may be awarded to relatives of the manager rather than on the basis of merit. In some authoritarian nations, it may be necessary to hire an unproductive representative of the political party in power in order to negotiate the bureaucracy and legal system. Corruption is commonplace in many nations, and business transactions may carry the expectation that key host nationals will receive substantial gifts in cash or in kind. The general system of social classes, in some cases castes, may make it difficult if not impossible to reward or promote an employee on the basis of individual merit. Employees of one social group may refuse to engage in certain work or business activities with members of another social group. Sometimes business as an occupation is held in low esteem. Business socializing and entertaining may require participating in activities and in places that seem unusual from an American point of view. Labor unions may be more cooperative or more confrontational than expected, or they may not exist. It may be impossible to fire a worker once hired, to lay off workers in a slow period, or to reward or punish individual employees for bad or good work and conduct on the job.

Political organization. The multinational corporation must make special efforts to maintain cordial relations with the host government. It should make special efforts to create and maintain a public image of good corporate citizenship. The multinational corporation should seek to be appreciated for its positive role in the economic development of the host country, but it may find itself under attack and accused of being an instrument of so-called neoimperialism, neocolonialism, economic dependency, and underdevelopment. In many foreign nations, political risks must be assessed continually, with full cognizance of such factors as a colonial past, intense nationalism, and issues of sovereignty. Sometimes there are concerns for the political stability of

a regime and its controlling groups, or with possibilities of nationalization, expropriation, or various forms of protectionism. In benign environments, host nationals often regard any job with a multinational corporation as a plum, and the company may find itself in a leadership role with regard to health and accident benefits, environmental concerns, and ideals of equality and opportunity.

Law. Business contracts may draw upon the legal principles of tribal, Hindu, Rabbinical, Islamic, Ottoman, Civil or Common law, or some unfamiliar mixture. In nations with authoritarian regimes, the rule of law may be weak or nil. Laws of the host nation may require that the government or host nationals own a percentage of the host company. Laws may require that a percentage of the company's rank-and-file employees and/or managers must be host nationals. The host nation may have laws restricting the production of the company's products, the materials used, or the content and style of the company's advertising and packaging.

Enculturation and education. In some countries or regions, low levels of functional literacy or mathematical ability may create difficulties in advertising the company product to potential consumers, or in consumers and workers failing to understand written instructions, hazard warning signs, and so forth. The guest company may find it necessary to create training programs for their host country employees in production, clerical, sales, and management positions. Increasingly, the guest company will offer training to its own expatriate employees in intercultural skills and knowledge specific to the host culture.

Personality and values. Personality characteristics, attitudes, or values in the host culture may differ in varying degrees from American norms. The host culture may not share positive attitudes toward punctuality, future orientation and long view, optimism about the future, willingness to take risks, diligence, work as meaningful, work as a source of personal achievement, frugality, savings and investment, rationality in decision making, cooperativeness within the work group, positive attitude towards new technology, alertness to opportunity, entrepreneurialism, personal appearance, cleanliness, orderliness, honesty, integrity, or disapproval of bribery.

Ideology and religion. Each nation has its own yearly round of religious and/or secular holidays, all of which have a bearing on local business operations. Some holidays are national, while others pertain to ethnic, religious, or other social groupings. Some businesses will close operations for the day(s), while others will remain open. Holidays requiring fasting or feasting will impact on consumption patterns of food and drink, and some holidays will feature special cuisine. Sometimes religious observances will be practiced on company premises, and may even be conducted in facilities provided by the company. Companies may find it prudent to invite religious specialists to conduct special rituals or ceremonies in conjunction with business operations, in order to determine auspicious circumstances, to invoke blessing or to ward off harm. Religious beliefs may create

seasonal spikes or slumps in consumer purchasing, may enforce taboos against or prescriptions for the purchase or use of certain products, and may restrict various aspects of company advertising.

Symbols, language, and writing. Advertising employs the artistic organization of line, shape, color, texture, sound, and other properties in ways that evoke desired responses in home-culture consumers. None of this may be taken for granted in a host culture. The size and shape of soft drink containers varies among nations. Few Westerners understand or appreciate the music of traditional Chinese opera; the fact that a fifth of the world's population loves it can instruct us in how difficult it might sometimes be to bridge differences in artistic styles. Company logos must be checked against host-culture interpretations. A red star on a standard Japanese product was seen to represent Communism and caused a flap in Taiwan during the Cold War. The Gerber baby was misunderstood by illiterate populations in Africa, who assumed that any food container would be depicting its contents on the label.

Brand names that work in one country may be laughable in another. In some Spanish-speaking countries, the Chevrolet *Nova* was a standing joke (*no va* translates *does not run*). In Syria during the early 1960s a local cola beverage used the prestige-seeking name of *Mobil-Up*. Chinese undershorts for men sport a flower logo and the English name *Pansy*. A Chinese brand of cigarettes named after the Chinese word for poker, uses romanization that spells out *Puke*. A health elixir made from the ginseng root is labeled *Ginsenocide*. The Chinese characters initially chosen to sound out the words "*Coca-Cola*" translated as *Bite the White Tadpole*. A subsequent, more felicitous set of same-sounding characters translates as *Happiness in the Mouth*.

There are approximately 3,000 languages spoken in the world today. Up to 3,000 languages have been lost in the last few centuries, and of those remaining, a little over 200 languages have sufficient numbers of speakers to assume international significance. A much smaller number of writing systems serve to convey these languages in print (Katzner, 1986). Multinational corporations must deal with whatever languages and writing systems are spoken and read by consumers in their host nations. Many nations are blessed by having a single dominant language, but some nations must cope with the difficulties and potential divisiveness of having multiple languages. India, for example, has 14 major languages. A business organization may find that more than one language is spoken by its employees. In locations where multiple languages are common, it will incur greater costs for translation, publication, and transmission of its advertising and servicing messages. Scientific and scholarly translation is costly to governments as well as business, so that higher education as well as business research, development, and technology transfer operations are carried out in English, French, and a handful of major national or regional languages (Terpstra & David, 1991).

Adaptation of Business Individuals to the Host Culture

Business personnel abroad must cope as individuals with the cultural differences confronting them and understand what constitutes appropriate and inappropriate behavior. The Cross-Cultural Adaptability Inventory (CCAI) offers a rigorously tested and widely used measure of intercultural sensitivity (Kelley & Meyers, 2001).

Often the expatriate spouse and children are the most deeply imbedded in the host culture and bear the brunt of cultural adaptation. They must contend with servants, shopping, and schools that may be worlds apart from the comfort zone of corporate offices. Completion of foreign postings is also fraught with intercultural difficulties when the home office fails to recognize and integrate the valuable experiences of their returned expatriates, who often go through reverse culture shock.

Material culture. The artifacts and machines of daily life may differ drastically in a host culture. A three-wheeled motorcycle taxi ride can be a frightening experience in Bangkok traffic, not to mention riding behind the driver of a motor scooter taxi in Barahona, Dominican Republic. An American might have difficulties remaining comfortable in a cross-legged sitting position at a Japanese table, squatting over a Middle Eastern toilet, or confronting a European bidet. He or she may be confused by the nonuse of sink stoppers in Colombia, the procedures of a Japanese bath, or the fine points of tucking in the mosquito netting over a bed in south China.

Cuisine. An American abroad may be unprepared for the host-culture foods or for alcoholic beverages like Taiwanese kaoliang or Mexican mescal, not to mention such delicacies as maguey worms, fried grasshoppers, raw fish, dog stew, or sheep eyeballs. The social rules for drinking alcoholic beverages may differ, or there may be strict prohibition against any drinking at all.

Social groupings. Family structure, secondary groups, and social roles will differ in the host culture. In southern Europe, one might need to learn to deal with the family firm. Executives in many Third World countries may not have the same power to make decisions and to conclude agreements as their American counterparts. The American businessperson may need to spend hours sipping coffee and chatting with other supplicants in Mexican waiting rooms, to meticulously remember all the favors he must dutifully reciprocate in Japan, or to assimilate the lifelong familistic affair that Chinese businessmen in southeast Asia seek to make of commercial relationships.

Class and caste. The principle of transfer or promotion to higher prestige occupations or positions on the basis of professional merit will be opposed by defenders of a rigid gender or class system.

Religion. The expressions of religion may adorn offices, busses, and company machinery. The Muslim workday is interrupted up to five times for prayers, and the Middle Eastern work force is divided into those that observe a

holy day and do not work on Friday, on Saturday, or on Sunday.

Personal space and body language. The primordial expressions of personal space and body language are modified by culture. While East Asian cultures maximize spacing, giving two persons room to bow, Eastern Mediterranean cultures prefer close face-to-face positions in which the communicants bathe each other in their breath.

Gestures. Gestures may sometimes mimic the real world, but are often arbitrary. Making a ring with thumb and index finger means "A-OK" in America, but is an obscenity in Brazil. To knock on a door in Mexico with a "shave and a haircut" rhythm also broadcasts an obscenity. A European executive nearly caused a riot in a restaurant in Oman when he unthinkingly passed a plate of food to his Arab counterpart with his left hand, which is associated with toilet hygiene.

Spoken language. It often comes as a shock the first time one finds oneself in a community where almost no one speaks his or her language. A common rudeness among travelers abroad is to discuss in their own language the host people and culture in the presence of individuals who they mistakenly presume do not understand.

INTERCULTURAL TRAINING: LANGUAGE, BACKGROUND, AND BEHAVIOR

A complete intercultural training will provide skills in the appropriate foreign language, general background knowledge of the culture, and mastery of the culturally appropriate behavior. Language instruction is costly and a great deal of time is required to achieve fluency. In contrast, cultural backgrounding and training for culturally appropriate behavior can be accomplished in as little as several days (Bhawuk, 1998; Landis & Bhagat, 1996; Serrie, 1989).

Foreign Language Instruction

Ideally all personnel should speak the language of the host culture. However, contrary to accepted wisdom, fluency in the host language is not the most important part of a businessperson's intercultural skills, although it is the most immediately apparent and impressive.

Language is a fundamental part of culture. While its structure is unrelated to cultural content, the vocabulary of any language carries all its important meanings and understandings. (Whorf, 1956, on the other hand, famously argued that the grammar of any language conditions unconscious thought.) In any case, it would be a mistake to assume that intercultural training can be imparted merely by requiring study of a foreign language. Important and subtle cultural nuances are indeed learned in the mastery of the vocabulary and grammar of any language. Often cultural behaviors are taught in the process of mastering standard or typical conversations. But there is a vast domain of understandings, behaviors, and material artifacts that cannot possibly be included in standard

language courses, and indeed are not the normal purview of language and linguistics. Only a limited number of these cultural elements are even written down and available in print. Most of them can only be learned in the field in the course of daily life. They must be practiced in actual real-life behavioral contexts in order to be fully mastered.

Mastering the appropriate behavior takes precedence over mastering the language. The two skills overlap, but are not the same. Mastery of the language is often presumed to indicate a prior knowledge of the forms of social interaction as well, despite the unlikelihood of more than a few simple interactional patterns being taught in a typical language class. There is a danger that if a foreign guest is fluent in the native language, he or she will be held to a higher standard of correct behavior as well.

Background Knowledge of the Host Culture

A working knowledge of the way society and government are organized is essential, along with a sense of important values and everyday mores and customs. Some familiarity with the history of a nation is important, and any additional knowledge of topics important to the host people will be an asset in ordinary interpersonal conversation. Such knowledge may even provide creative avenues to solving business problems in the host culture or to creating or introducing new products for its market.

Some nations take great pride in their archeology and the brilliant ancient civilizations that form their heritage. Ancient Greece, for example, developed the first democracy, the principles of logic, and the systematic inquiry into the natural world that led to modern science. Beginning in the Han Dynasty, ancient China developed a system of government schools and public competitive examinations that established the first meritocratic civil service. In the history of art, music, and literature, many nations have brilliant traditions. Icelanders of today are avid readers of their Icelandic Sagas and can identify their ancestors among the characters. A number of Latin American nations have been on the cutting edge of modern architecture.

Every nation in the world has elements of its culture in which it takes especial pride, and any knowledge of these topics, or any interest and willingness to learn about them from host nationals, can create rapport and build friendships across cultural boundaries. For a nation like Iceland, knowledge of its tectonic geology is not only fascinating in its own right, but directly related to its economic comparative advantages in geothermal energy, cheap electricity, and the production of aluminum.

A multidisciplinary course on the host nation or region will provide adequate background knowledge of the host culture. Documentary films and videos will provide visual amplification of the readings. In addition, feature films and novels from the host culture will provide vicarious experience of characters, personalities, conflicts, and resolutions that resonate with large audiences. Often this will whet

an appetite to deepen one's knowledge of the host culture over time

During World War II, anthropologists carried out research at a distance on the cultures of the Axis Powers in an effort to aid the war effort. Such work was of inestimable value in providing intercultural understanding. The most famous and prescient work was Ruth Benedict's The Chrysanthemum and the Sword (1946), which provided America with guidelines that helped shape the Japanese unconditional surrender and successful postwar occupation. In the postwar period, Francis L. K. Hsu, in a series of books such as Americans and Chinese (1987), provided important insights into the fundamental cultural differences between those two cultures. In recent decades, a major analyst of cultural differences is Geert Hofstede, who in Culture's Consequences: International Differences in Work-Related Values (1980) and other publications has provided a way to statistically measure differences in power distance, uncertainty avoidance, individualism, and masculinity in the national cultures of the world.

Mastery of Culturally Appropriate Behavior

The bottom line of successful intercultural interaction is to master the appropriate behavior for each situation in which we will find ourselves. Mastering situation-specific behavior will require that we go beyond a general background knowledge of the host culture and acquire a mastery of the social roles that we will be expected to play there. Our social roles will have certain culturally standardized aspects, as in greeting and leave-taking, eating, drinking, and giftgiving, within and around which the concerns that are of importance to us and our counterparts may be acted out. We must know what is appropriate behavior for ourselves as men or women of our age and position, and we must know what is appropriate behavior for others, in such categories as women, men, children, and the elderly. We must know the distinctions of class and status that divide people, and the observances of various customs that punctuate the day.

PRINCIPLES OF INTERCULTURAL TRAINING

Focus on Intercultural Errors

The most effective training techniques focus on the individual discerning and correcting intercultural mistakes. The nature of such mistakes and the harm they may cause must be clearly understood. Because of the tremendous complexities and challenges of life as an expatriate, some intercultural mistakes will probably be inevitable. Nevertheless, it is essential that the trainee learn to predict and avoid as many as possible and to discern and resolve all those that do occur.

 Discern the Negative Cues: The trainee develops practice in discerning cues that an intercultural mistake has been made. Someone playing the role of host counterpart reacts in a way counter to what the trainee would expect in his own culture. The cultural host does not understand the trainee's behavior, she does not get the joke, she has ignored or forgotten the request, or she is unintentionally insulted or offended. Her facial expressions may be unexpectedly smiling, blank, cold, or angry.

- Cease and Desist: In response to such cues, the trainee learns to withdraw from the offending behavior, backpedal, and try to restore equanimity. That failing, the trainee should applogize and leave the scene.
- 3. Seek Understanding: As soon as possible following an intercultural error, and in a private context, the trainee seeks an explanation from an intercultural confidant from the host culture. He understands the nature of his mistake and resolves not to repeat it in the future.
- 4. *Make Amends*: As soon as possible, the trainee tries to make amends with the offended party. An apology, sometimes accompanied by a small gift, will usually suffice. A trusted translator can often be invaluable in mending relationships following an intercultural error.

Intercultural Errors Are Not Always Predictable

There are many books available that list the "do's and taboos" in specific countries or around the world. They usually provide many useful tips for successful intercultural adaptation, and they are worth consulting. However, they can not possibly cover everything a businessperson needs to know about the host culture.

For some places, there is no available material. Even when cultural guidebooks are available, some of the advice may not apply in specific locales. Given the rapid rate of cultural change almost everywhere, some of the advice may be obsolete.

Some of the culturally specific appropriate behavior that we must learn in a foreign country is not clearly discernable. It is usually not verbalized and may not be in the conscious minds of host nationals—until we violate the patterns. Cultural rules do not follow a pattern that might be considered logical in one's home culture. From an outsider point of view, they may seem arbitrary or even contradictory.

Not all appropriate behavior can be learned before we arrive in the host country. Because some of it is unpredictable, we can only learn it by trial and error. Intercultural training offers preparation not only in some of the predictable elements of the host culture, but also in the critical skills for coping with the unpredictable.

Make Use of Persons From Other Cultures or With Overseas Experience

Foreign nationals can provide invaluable assistance in any intercultural training. They are, after all, the native ex-

perts on their culture and they usually have had a great deal of experience observing the intercultural errors of visitors in their home country.

Those who have returned from overseas field assignments or programs are also invaluable in intercultural training. They are experts on culture shock and the intercultural adjustment to a host culture. They have personally and experientially been confronted with the challenge of integrating into a foreign culture. They usually have many practical tips on what to do and what not to do in the host culture.

Intercultural Guidelines

- Responsibility: Assume responsibility for the outcomes of your actions.
- 2. Caution: Exercise caution. Imagine that you have been blindfolded. Proceed cautiously, feeling your way, perceiving obstacles, places without footing, and other dangers. Unless you are already familiar with the tacit rules for interaction and general behavior of the culture you are operating in, remember that you are culture-blind. Above all, do no harm.
- 3. *Flexibility:* Be flexible. Make every effort to be accepting or tolerant of cultural elements that jolt your ethnocentrism. Remember that in a foreign country you are a guest.
- 4. *Understanding:* Get to know people. This is done by expressing an interest in them, in aspects of their lives. It must be done in a friendly, polite, and interculturally appropriate way.
- Sensitivity: Be sensitive to the people and the situation. Do not talk at people, but rather talk to them, talk with them.
 Try to leave each conversation having achieved a sense of mutual understanding. Do not exploit.
- 6. Reciprocity: Reciprocate the kindnesses various persons are likely to extend to you, whether you do this in a material or symbolic way. Make sure that the forms of your reciprocation are culturally appropriate. Be aware that the forms of reciprocation are culture specific, and that symbolic gestures may be equal to or greater than material gifts in certain situations.
- 7. Mediation: Find a friend or associate among your host country counterparts who can serve as an intercultural confidant. You must find someone trustworthy who will instruct you in the fine points of correct behavior in his or her culture, correcting your errors in a positive way and explaining the different worldview that lies behind the most innocuous exchanges. Ideally, this should be someone of the same gender, roughly the same age, with no linguistic barriers between you, no significant material benefits that one hopes to derive from the other, and with whom you have common interests. You might consider meeting a

- number of host country nationals before developing this relationship; sometimes the first person to befriend a newly arrived stranger is someone who is marginal to his own culture. Beyond the practical utility of this relationship, your loneliness and isolation will be eased in what often becomes a deep friendship.
- 8. Continuity: Stay in touch with the good friends you will have made in your host culture. The long-term relationships that you are able to sustain with international friends will enrich your life as all friends do and develop you as a successful cosmopolitan manager. (Serrie, 1986)

Intercultural Caveats

There is much abuse of the concept of cultural relativity. All cultures are not equal. There are vast technological differences among the present-day cultures of the world, with profound effects on economy, sociopolitical organization, and ideation. Morally, all cultures are not always good. Sometimes a national government, supported by a large majority of its people (such as Nazi Germany) will carry out programs of unmitigated evil (Hatch, 1983). As with human individuals, wealth and power do not automatically confer virtue on human cultures.

Anthropologists in the field attempt to study a culture on its own terms, and this is a useful approach for any expatriate coping with his or her host culture. Nevertheless, there are limits to what anyone should be compelled to think and do when abroad. There are two caveats, conditioned by morality and safety, that are important to remember in intercultural relations.

- 1. *Intercultural Safety:* Whatever the host culture may seem to permit, no one from any culture should engage in any behavior that he or she personally regards as dangerous to life or health.
- 2. *Intercultural Morality:* Whatever the host culture may seem to permit, no one from any culture should engage in any behavior that he or she personally regards as immoral.

REFERENCES AND FURTHER READINGS

- Benedict, R. (1946). *The chrysanthemum and the sword*. Boston: Houghton Mifflin.
- Bhawuk, D. P. S. (1998). The role of culture theory in cross-cultural training. *Journal of Cross-Cultural Psychology*, 29(5), 630–655.

- Brislin, R. W., Cushner, K., Cherrie, C., & Yong, M. (1986). Intercultural interactions: A practical guide. Beverly Hills, CA: Sage.
- Ferraro, G. P. (2006). *The cultural dimensions of international business*. Upper Saddle River, NJ: Pearson Prentice Hall.
- Harris, M. (1966). *The rise of anthropological theory: A history of theories of culture*. New York: Thomas Y. Crowell.
- Hatch, E. (1983). *Culture and morality: The relativity of values in anthropology*. New York: Columbia University Press.
- Haviland, W. A., Prins, H. E., Walrath, D., & McBride, B. (2007). The essence of anthropology. Belmont, CA: Thomson Wadsworth.
- Hofstede, G. (1980). Culture's consequences: International differences in work-related values. Beverly Hills, CA: Sage.
- Hsu, F. L. K. (1987). Americans and Chinese: Passages to differences (3rd ed.). Honolulu: University of Hawaii Press.
- Katzner, K. (1986). Languages of the world. London: Routledge.Kelley, C., & Meyers, J. (2001). CCAI: Cross-cultural adaptability inventory. Minneapolis, MN: National Computer Systems.
- Kroeber, A. L., & Kluckhohn, C. (1952). Culture: A critical review of concepts and definitions. Cambridge, MA: Peabody Museum of Archaeology and Ethnology, Harvard University.
- Landis, D., & Bhagat, R. S. (Eds.). (1996). *Handbook of inter-cultural training* (2nd ed.). Thousand Oaks, CA: Sage.
- Prahalad, C. K. (2005). *The fortune at the bottom of the pyramid:* Eradicating poverty through profits. Upper Saddle River, NJ: Wharton School Publishing.
- Ricks, D. A. (1993). *Blunders in international business*. Cambridge, UK: Blackwell Publishers.
- Serrie, H. (Ed.). (1986). *Anthropology and international business: Studies in third world societies* (No 28). Williamsburg, VA: College of William and Mary.
- Serrie, H. (1989). An anthropology-led major in international business. *Practicing Anthropology*, 11(4), 8–10.
- Serrie, H. (1991, April 5). The large, lucrative peasant market. *The Wall Street Journal*, p. A12.
- Serrie, H. (1992). Teaching cross-cultural management skills. *Journal of Teaching in International Business*, 3(3), 75–91.
- Serrie, H. (Ed.). (1994). What can multinationals do for peasants? In *Studies in third world societies* (No. 49). Williamsburg, VA: College of William and Mary.
- Sizoo, S., & Serrie, H. (2004). Developing cross-cultural skills of international business students: An experiment. *Journal of Instructional Psychology* 31(2), 160–166.
- Terpstra, V., & Kenneth, K. D. (1991). *The cultural environment of international business*. Cincinnati, OH: South-Western Publishing.
- Tylor, E. B. (1958). *Primitive culture*. New York: Harper Torchbooks. (Original work published 1871)
- Whorf, B. (1956). *Language, thought and reality*. Cambridge, UK: Technology Press.

EMOTION IN ORGANIZATIONS

KEVIN E. FOX AND STEPHANIE E. GRANDA Saint Louis University

ooking back over the past century of research and practice focusing on the role of emotion in organizations, it is clear that emotions have always been considered; yet how they are valued by managers has changed tremendously over time. While early researchers such as Rexford Hersey, as well as F. L. Roethlisberger and colleagues, spent considerable effort examining workers' emotions and reactions to workplace conditions in the 1930s, the dominant attitude among management scholars during that time centered around Frederick Taylor's industrial efficiency movement. This attitude was made explicit by Willliam H. Whyte in the 1950s when he defined ideal businessmen as being driven by logic and rationality. To Whyte, emotions were considered influences to be minimized and ignored when possible. And although adherence to Taylor's principles of scientific management ultimately did not last, the belief that feelings and emotions are not important to job performance survives to current times.

Despite this reluctance by some to acknowledge a legitimate role for emotions in the workplace, the simple fact is that emotions are a necessary and fundamental aspect of human existence. One way in which this awareness was tacitly acknowledged was through the widespread acceptance by managers of the value of job satisfaction. This appreciation for job satisfaction grew from what is often referred to as the "happy-productive worker hypothesis," which states that when workers are happy (satisfied), they will be more productive than they will when they

are unhappy. However, there are two important caveats regarding this hypothesis. First, despite nearly 50 years of research on this topic, there is still relatively little evidence that satisfied employees are significantly more productive than less satisfied employees (Fisher, 2003). Second, as many scholars have recently noted, job satisfaction is not an emotion; it is an attitude. This distinction is important to keep in mind because, while attitudes do contain an emotional component, they are also strongly influenced by both thoughts (cognitions) and behavior. While it is likely that the cognitive aspect made job satisfaction more acceptable for managers resistant to valuing emotions in the workplace, ultimately, due to its mixed nature, it did not serve managers or employees well.

The resurgence of interest in the role of emotion in organizational life over the past 20 years has been widely noted among scholars and eagerly embraced by many businesses. This heightened attention has been the result of a broader societal trend toward the recognition and acceptance of the noncognitive influences on organizational life. Furthermore, several new theories and models have been developed in the area, each offering possible explanations for the psychological processes underlying the influence of emotion on workplace behaviors. Subsequently, research investigating the role that affect plays in predicting work-related behaviors such as job performance, absenteeism, organizational citizenship, and counterproductive work behaviors continues to increase.

Despite this enthusiasm, managers and scholars face three key challenges. The first is resolving the widespread confusion about what exactly is meant by words like *emotion*, *mood*, and *affect*. Though at first glance, most people may feel that they know what these terms mean, their definitions and use in research and practice vary greatly. A second challenge is continuing to develop and refine emotion specific theories. While numerous theories include emotional information, a growing area of scholarship focuses on developing and improving theories that explain the antecedents, processes, and consequences of different types of emotion in the workplace. Third, scholars and practitioners must actively seek to integrate research findings from multiple sources so that a broad understanding of the role that emotion plays in organizations can be attained.

This chapter begins the presentation of key definitions and terms used in emotion scholarship, including affect, emotion, mood, affective disposition, and traits. This is followed by a review of several of the more recent and influential theories describing the processes through which emotion influences organizational behavior. In particular, the groundbreaking theoretical work of Howard Weiss and Russell Cropanzano's (1996) Affective Events Theory, and Joseph Foragas' (1995) Affect Infusion Model are discussed. Alternatively, while these theories are mostly known only by academics, the works of Arlie Hochschild (1983) on emotional labor and Daniel Goleman (1997) on emotional intelligence have reached widespread recognition in the general public, and as such, each is also reviewed. In the next section, brief summaries of key research findings and applications of emotions in organizational behavior are offered. These short sections serve as introductions into our expanding knowledge and include, among others, discussions on the influence of emotion on aspects of organizational life critical to 21st-century management (e.g., job performance, leadership, and stress). As the preceding sections establish, evidence continues to build regarding the importance of emotions in the workplace. As a result, numerous calls have been made to incorporate emotion into personnel management systems. The following two sections introduce readers to ways by which emotions can be incorporated into management practices and discuss cross-cultural considerations. In the final section, a summary and a number of suggestions for future research are offered, along with suggested readings. It is the purpose of this chapter to provide readers with a starting point for understanding the critical role that emotion plays in 21stcentury management.

THEORETICAL FRAMEWORKS

Defining Emotion

The label of "emotion" encompasses a wide range of phenomena, including feelings, changes in behavior and cognitions, engagement in impulsive or involuntary behavior and thoughts, relative tenacity of beliefs, changes in the relationship between a person and his or her environment, and physiological changes not caused by physical conditions. Given this definition of emotion, it is important to distinguish what differentiates emotion from other widely used terms. Howard Weiss (2002) has provided a framework for understanding the different constructs that fall within this broad domain. In his framework, the term *affective states* refers to a family of related entities that he labels as "mood," "stress," and "emotion." *Affect* is a broad term used to describe any emotion related term (e.g., mood, stress, and discrete emotions). Stress is defined as an immediate negative psychological and/or aroused physiological state arising from an individual's experience of an aversive environmental challenge.

Emotions are a large class of discrete affective states such as anger, fear, and guilt. There are as many emotions as can be identified by a given language. Russell (1997) reported that as many as 2,000 emotionally descriptive words may be present in the English language. Given this large pool of potential emotions, it is useful to identify a subset of emotions that might be more important than others. While there is some disagreement as to specifics, many researchers endorse a viewpoint that emphasizes the importance of a small subset of "basic" or universal emotions (e.g., happiness, surprise, fear, sadness, anger, and disgust). An alternative perspective of emotions suggests they can be understood by examining their location along the continuum of two or three fundamental dimensions. This approach, often referred to as the "circumplex model," suggests that all emotions can be considered blends of these core dimensions. The general consensus among circumplex researchers is that the two core dimensions are valence (pleasant-unpleasant) and arousal (high-low activation). Using this circumplex, the specific emotion of anger would be defined as a combination of high activation and high unpleasantness, whereas contentment would be a combination of low activation and high pleasantness. Watson and Tellegen (1985) revised this model by rotating the axes of the circumplex by 45° and relabeling them "positive affect" (PA) and "negative affect" (NA). High levels of PA are characterized by enthusiasm and optimism, while high levels of NA are represented by anxiousness and nervousness. The predominant use of PA and NA in affect research laid the foundation for nearly 20 years of renewed interest in workplace affect.

Emotions and moods are primarily distinguished not in content, but rather, by their degree of intensity and duration. Relative to emotions, moods are defined as being more diffuse, more enduring, and less related to specific environmental phenomena. For example, emotion would be evidenced by the statement "That movie ending made me angry," while, "I'm feeling angry today" would be more indicative of a mood state. In both cases, anger is the defining affective label; however, the behavioral and cognitive implications of anger emotion and anger mood are different. A person feeling the emotion of anger at one moment, might

in a few minutes experience a completely different emotion (e.g., feeling pleasure after having a conversation with a friend about how bad a movie ending was), whereas a person in an angry mood is likely to remain feeling angry well after any source of anger-inciting stimuli has been removed. Thus, the defining distinctions between moods and discrete emotions are (a) moods are more enduring than emotions; (b) moods are not formed as distinct and immediate reactions to specific objects, people, or events; and (c) moods are more resistant to change than are emotions.

Emotional Disposition (Traits)

The affective disposition perspective stresses the critical difference between state and trait affect as independent constructs playing distinct roles in determining workplace behavior. Randy Larsen and his colleagues (Larsen, Diener, & Lucas, 2002) point out four critical reasons why state and trait affect must be carefully conceptualized and measured distinctly from one another: (a) mood states are more proximal than trait affect and, as such, may have direct effects on specific behaviors and attitudes that trait affect does not have; (b) the causal direction of mood states may be different from that of traits (e.g., moods are influenced by events while traits influence events); (c) because trait affect is stable, it might allow for prediction of behavior and emotional reactions to events; and (d) researchers often confuse state and trait in the current research (e.g., correlating trait affect and helping behavior, then claiming that people engage in more helping behavior when they are in a good mood). Avoiding this conceptual confusion is not difficult, but it requires being mindful of the definition of the construct under investigation and aligning measurement correspondingly. While moods are certainly influenced by trait affect, by definition, they are general reactions to environmental events and as such are indivisibly linked to environmental conditions and events. Thus, the distinction between trait and state affect is defined by measuring how one feels generally versus how one feels during a specific and relatively brief moment in time (e.g., today, or this week).

Yet, if PA and NA are to be considered as universal affective traits, evidence must be provided to support the claim that they are universally prevalent and relatively stable individual differences. Evidence of a biological origin of PA and NA would provide strong evidence to support this claim, as biological foundations underlie many of our most widely studied individual differences (e.g., sex, race, ability). Evidence suggesting the biological origin and stability of trait PA and NA has come from several sources. Numerous studies have detailed the neurophysiological research supporting distinct brain activity differences between those high and low in PA and NA. Second, in a compelling study examining the long-term stability of PA and NA over 23 years, crossing four generations and nearly 3,000 subjects, Charles, Reynolds, and Gatz (2001) found that NA slowly decreased with age while PA remained stable until old age, when it decreased slightly. Third, Watson and his colleagues

(Watson, Wiese, Vaidya, & Tellegen, 1999) concluded that PA follows a circadian rhythm while NA remains fairly stable across time. Taken as a whole, these studies provide justification for the conceptualization and existence of trait PA and NA as distinct affective traits.

Research examining the role of trait affect in predicting workplace behavior has generally taken one, or both, of two approaches. The first approach holds that trait affect directly influences workplace attitudes and behaviors, while the second approach suggests that trait affect may have a more indirect effect by moderating the relationship between situational variables (e.g., job characteristics) and outcomes (e.g., performance, stress). Additionally, it is common for researchers to adopt both approaches in the same study. Findings based on both of these perspectives support the view that trait affect asserts both direct and indirect effects on workplace behaviors and attitudes.

Affective Events Theory (AET)

Howard Weiss and Russell Cropanzano's (1996) Affective Events Theory (AET) has generated enormous interest over the last decade and is distinct from previous theories in a number of critical ways. First, rather than assuming that emotions and moods are stable antecedents of behavior and attitudes, AET suggests that emotion plays a more dynamic role that is initiated as a reaction to, rather than as a cause of, workplace events. This is not to say that affect does not have a subsequent effect on behavior, but rather that AET emphasizes that events and affect interact in a continuous cycle. Second, in contrast to dispositional theories of trait affect, which are primarily assessed using the broad PA and NA constructs, AET has the potential to enhance understanding of the complex process of specific emotional reactions as they relate to discrete workplace events (e.g., being turned down for a promotion leads to the specific emotions of rejection and anger, but not of fear and disgust). A third innovative aspect of AET is its consideration of the episodic nature of emotions and job performance in that it recognizes the inherent ebb and flow of moods and emotions throughout the workday as individuals are exposed to multiple affectively stimulating events. It is through examining the accumulating effects of multiple performance episodes and an individual's corresponding affective experiences that AET proves most useful.

Finally, AET encompasses a model within its framework for understanding both proximal affective reactions to workplace events and the distal effects of trait affective dispositions. According to AET, the workplace environment (i.e., characteristics of the job and organization) leads to work events (e.g., having a meeting, writing a report) that, in turn, lead to affective reactions. These affective reactions are, in part, moderated by trait affective dispositions (PA & NA), and the effect of trait dispositions on work attitudes and behavior is mediated by affective reactions. In the original AET model, all affect-driven behaviors are considered the result of affective reactions. Recently, however, Weiss

(2002) further distinguished that some behaviors result from the affective state itself, while other behaviors result from attempts to regulate affective states. Without fundamentally altering the original theory, this addition opens the way for affective dispositions to directly influence subsequent affect regulation behavior, whereas the original model does not make this explicit.

As such, AET has formed the theoretical basis for a number of recent workplace studies examining the dynamic relationship between work events and emotions within a single person during a workday. This use of "experience sampling" methodologies has allowed researchers to examine the independent effects of state affect beyond trait affect in relation to job attitudes and job performance.

Affect Infusion Model (AIM)

The Affect Infusion Model, or AIM (Forgas, 1995), was developed using an information processing approach to understanding the role of moods in the workplace. Essentially, AIM postulates that affective states motivate an individual to engage in specific cognitive strategies and direct attention toward mood-reinforcing information, which results in a specific affect congruent behavior or attitude. Appreciably, AIM offers a specific set of guidelines to identify when cognitive processes are likely to be infused with affect and when affect may play no role.

Critical to determining the impact of affect on workplace outcomes are the types of situational demands to which individuals must adapt and decisions that individuals must make to successfully achieve their goals in the workplace. The reason for this is that different types of cognitive processes allow different amounts of affect infusion (i.e., less structured or routine cognitive processes allow for more affect infusion than do more structured or repetitive cognitive tasks). It is essential, then, to understand what types of situations and decisions result in specific levels of affect infusion. Three sets of characteristics influence the type of processing in which a person is most likely to engage: (a) personal variables (e.g., personality, intelligence, and mood), (b) task characteristics (e.g., familiarity, typicality, complexity), and (c) situational features (e.g., demands, publicity, level of scrutiny).

When a decision is made, one of four types of processing will be engaged. First, direct access processing results when an individual needs to perform a habitual or routine task that follows a well-established set of actions or decisions (e.g., dialing a telephone, preparing a computer for normal use) and allows little, if any, affective infusion. Second, motivated processing occurs when an individual is motivated to make decisions designed to allow him or her to achieve a predetermined goal. In this case, there is little opportunity for affect to influence cognitive processes, as the individual has already decided what to do (e.g., helping a supervisor in the month preceding promotion). Third, heuristic processing is engaged when there are no preexisting rules or moti-

vational goals regarding a particular action. This processing strategy is most commonly engaged when the individual has little or no investment in the outcome of an action and allows moderate levels of affect infusion. For example, if asked, "How are you doing?" by an acquaintance, a person may respond positively, neutrally, or negatively, depending on his or her current mood state, rather than engage in a more cognitively taxing thought process to determine how one is really doing. Fourth, substantive processing allows the greatest impact of current mood on thought processes. Substantive processing occurs when individuals must uncover and process new information. This open processing style frequently causes individuals to attend to affectively primed information that is mood congruent and is often unconsciously incorporated into judgments and planned behavior. For example, when tasked with developing recommendations on how to improve an organization's relationship with employees, an employee might focus his or her work on reducing bureaucracy because of a recent negative experience with it, as opposed to addressing a potentially more critical inequity such as below-market compensation.

By determining the personal, situational, and task characteristics of an individual, it is possible using AIM to predict when emotions are likely to influence workplace attitudes and behavior. While limited workplace research uses the AIM for making predictions, it is clear that AIM provides a robust theoretical framework for making specific and testable hypotheses about the role of affect in the workplace.

Emotional Intelligence (EI)

Emotional intelligence (EI) is typically defined as an ability or set of abilities that enable an individual to recognize and manage their own, and others', emotions. Although Peter Salovey and John Mayer (1990) first introduced the concept, Daniel Goleman (1997) brought EI to the public arena with his bestselling book. The concept has gained widespread attention from both practitioners and scientists, mainly due to its proposed relationships to work outcomes and general life achievement. In general, models of EI can be separated into two categories. One perspective is advocated by Mayer and Salovey (1997) who propose that EI is a pure ability similar in nature to intellectual ability. Their model is comprised of four abilities: (a) perceiving emotions, (b) using emotions, (c) understanding emotions, and (d) managing emotions. The levels are progressive, meaning that higher order EI abilities require lower level abilities to build upon. For instance, to be able to manage emotions, individuals must be able to first perceive, facilitate, and understand emotions. The second perspective is often referred to as a "mixed model," which means that it includes both abilities and emotion relevant traits. Goleman's popular theory of EI is an example, as it includes such nonabilities as self-confidence and integrity. Others (Tett, Fox, & Wang, 2005) adopt a trait approach to EI by assessing individual's perceptions of emotional self-efficacy rather than actual ability. This distinction can be useful in determining, as the trait approach captures the motivational or "will do" component, while the ability approach captures talent or "can do" aspects of EI.

While EI has been proposed to be a determinate of many important work outcomes, including leadership and job performance, limited empirical evidence is available. To date, both ability- and trait-based EI measures have yielded limited results. For instance, those with higher ability EI were viewed as transformational leaders by their subordinates (Rubin, Munz, & Bommer, 2005). In a study by Wong and Law (2002), higher levels of a leader's trait EI was linked to increased job satisfaction and citizenship behaviors. Additionally, studies examining both ability and trait EI have reported initial evidence that EI predicts job performance beyond the effects of intelligence and normal personality. While encouraging, these limited findings emphasize the need for additional research before any conclusive judgments can be made regarding the value of EI to organizations.

Emotional Labor

On a daily basis, funeral directors remain poised in front of grieving individuals, police officers and firefighters maintain their calm in the face of danger, and customer service representatives continue to be friendly with unruly customers. While these individuals are behaving in socially acceptable ways, for some individuals, there is a gap between the emotions they are displaying and the emotions they are actually experiencing. Arlie Hochschild (1983) brought this phenomenon to national awareness when she described this process of managing the gap between true emotion and emotional displays and labeled it "emotional labor."

Many organizations encourage emotional labor as a mechanism for maintaining performance and customer satisfaction. As a result, organizations often reward individuals for maintaining appropriate emotions. For example, firefighters and police officers are awarded for bravery, whereas customer service representatives receive praise and recognition for going "above and beyond" the job duties for difficult clients. Alternately, inappropriate displays of emotions are carefully sanctioned by organizations. If a hottempered customer service representative responded unfavorably toward an unruly customer, the employee would most likely face negative consequences.

Research on emotional labor has produced contradicting evidence. Some findings suggest that emotional labor leads to stress or burnout, with researchers advocating for the reduction of emotional labor through appropriate stress management initiatives or by providing employees with personal control to determine their responses (Grandey, Fisk, & Steiner, 2005). Another set of findings concluded

that employees view emotional labor as a component of the job, thereby resulting in little to no experience of stress. Additional research, perhaps investigating the cognitive component of emotional labor and how individuals frame their job duties, may lead to a more clear understanding of emotional labor's outcomes. While important questions remain, it is clear that the degree to which individuals must manage their emotions at work will play an important role in determining how employees experience emotions in the workplace.

RESEARCH FINDINGS AND APPLICATIONS

Creativity

In order to stay ahead of industry standards, many organizations encourage innovation and creativity in the workplace. As we move from the informational age into a new age characterized by rapid change and conceptualization, employees capable of connecting information and providing novel solutions serve as organizational assets. Research on creativity suggests that creativity involves both cognitive and affective processes. Because the majority of research on creativity and has found that increased creativity to be associated with higher levels of PA, organizations seeking to enhance employees creativity should emphasize a work environment that promotes positive emotional experiences. For instance, employees should be provided with adequate resources and tools to accomplish their job, as well as the management support needed to implement creative solutions to problems. Additionally, if work assignments require creative thinking or analysis, managers should seek to be aware of employees' negative emotional states, which often hinder creativity. When possible, managers can attempt to encourage positive emotions in employees by offering encouragement and support, which many studies have shown to enhance positive emotions.

Decision Making and Negotiation

Managers and employees make decisions on a daily basis, and some jobs require negotiation. While affective experiences are inherent throughout decision making and negotiation, a universal relationship between specific affective responses and effectiveness has yet to be determined. There are conflicting perspectives on the relationship between affect and decision making. One line of evidence suggests that employees in positive moods tend to process information more quickly, resulting in better decision making and negotiation outcomes. Similarly, others have found that increased presence of negative emotions decreases effectiveness in negotiation. Alternately, other research has shown that individuals who are more positive tend to be unrealistically optimistic, making them susceptible to overconfident assessments, while those in negative

moods to tend to make more accurate decisions. Other researchers emphasize the critical affective interplay between the negotiator and the respondent in negotiation. In a study by Gibson and Fichman (2006), debt collectors were trained to identify whether or not the debtor displayed NA or PA. Then the collectors responded by encouraging respondents who displayed NA and threatening respondents who displayed PA. As a result, participants who reacted to the debtor's emotional displays were more likely to reach agreements and gain debtor commitment for repayment. So while evidence regarding the role of affect in decision making and negotiation is mixed, it is clear that both processes are strongly influenced by it.

.Iob Performance

As early as the 1930s, managers noticed employees who were in better moods tended to extend their efforts above and beyond their job duties, and in some cases, even perform better. Today, the term organizational citizenship behavior (OCBs) is used to describe employees who advance their organization's performance by exceeding the narrow confines of their specific job duties. For example, employees display OCBs by working overtime to meet deadlines or increasing morale by organizing employee social events. Research supports the belief that employees experiencing positive moods are more likely to engage in OCBs and also tend to be more productive at work (George, 1991). Findings have also linked increased job performance with high levels of affective commitment, which is characterized by an emotional attachment and sense of loyalty to an organization. Employees reporting greater affective commitment consistently display more OCBs and less counterproductive behaviors in organizations, ultimately leading to increased productivity. Alternately, high NA tends to be associated with cognitive overload and poor performance.

While organizational citizenship behaviors tend to increase job performance, counterproductive work behaviors have been shown to negatively impact job performance and organizational outcomes. Types of counterproductive work behaviors can be aimed at different targets, including organizations, supervisors, and coworkers. They also vary in type, ranging from tardiness and absenteeism to violence, theft, revenge, and abuse. Studies have found an association between counterproductive work behaviors and negative moods and emotions, in particular, anger, aggression, and hostility. To understand this process, Suzy Fox and Paul Spector (2004) proposed a stressor-emotion theory of counterproductive work behaviors. This model focuses on the interaction of organizational stressors, personality, sense of control, and emotions to explain counterproductive work behaviors. AET also provides theoretical groundwork for understanding counterproductive work behaviors, as the combination of events (stressors), cognitions (perceived control), and affective (evaluations) experiences influence behaviors.

Leadership

Over time, many theories on how leaders interact with their followers have been proposed. Early studies of leadership focused on personality characteristics and identified sociability, intelligence, and insight as key traits of leaders. Subsequently, scholars expanded the study of leadership to include the connection between leaders and the environment. A number of studies showed that leaders could motivate followers through responding appropriately to situational demands by rewarding employees and establishing goals. More recently, researchers began to deemphasize the transactional nature of rewarding followers in favor of emphasizing transformational leadership, which centers on emotional and the relationship between leaders and followers.

Transformational leaders are thought to exhibit charisma, inspiring followers to grow and change in such a manner that facilitates the advancement of leaders' vision. A key component of transformational leadership may include aspects of EI such as the ability to recognize emotions in others (Rubin et al., 2005). Studies have suggested transformation leaders are successful at spreading their own emotions (positive or negative) throughout a group as a means of motivating followers, a process referred to as "emotional contagion." Transformational leaders will use a variety of methods for conveying emotion to followers, including symbols and their attached meanings (Ashforth & Humphrey, 1995). For instance, leaders who create an "open-door policy" use the symbol of an open door to communicate their availability and interest in connecting with employees. When leaders implement suggestion boxes and employee surveys, they show employees that they value their opinions, which serves to enhance the leader-follower relationship. Ultimately, the goal of these relationshipbuilding initiatives is to enhance positive emotions and employee morale toward the leader and organization.

Motivation/Goals

Employees experience a variety of emotions on the job, ranging from happiness to anger to shame. Due to the variation between types of emotions, Pinder (1998) suggested that different emotions elicit varied reactions in employees and serve as motivators on the job. For instance, happiness is associated with positive feelings, which are likely to lead to successful interpersonal relationships and helping behaviors at work. In contrast, shame is linked with embarrassment and humiliation, which often occurs when employees do not achieve established standards. When experiencing shame at work, employees may respond by extending additional effort to close the gap or by attributing their failure to other employees or to organizational systems. As evidenced, affective processes and discrete emotions play a role in employee motivation, with some research suggesting core affective experiences are an inherent component of motivation, impacting the direction, intensity, and persistence in achieving goals (Seo, Barret, & Bartunek, 2004).

Stress

Pressure to meet project deadlines, interact with difficult coworkers, and manage home and work responsibilities are common stressors for many employees. As a result, most employees are familiar with the physiological (e.g., loss or gain in appetite, exhaustion), mental (e.g., cognitive overload), and emotional (e.g., feeling overwhelmed, anxious) signs of stress. Given that emotions are an integral component of the very nature of stress, workplace events that increase negative emotions are likely to lead to increased levels of stress. Employees who are exposed to prolonged conditions of stress may become susceptible to burnout. Burnout consists of three dimensions: (a) emotional exhaustion, (b) depersonalization, and (c) diminished sense of personal accomplishment. High NA is associated with high levels of emotional exhaustion and depersonalization, as well as lower levels of personal accomplishment (Thoresen, Kaplan, Barsky, Warren, & de Chermont, 2003). Stress interventions created by managers and human resource departments are most effective when targeted at both individuals and the organization. Organizational interventions include job redesign, flex-time options, and workload adjustments, whereas individual interventions include training in personal coping strategies or time management. Creating positive emotional experiences at work is one way managers can attempt to reduce burnout—in particular, emotional exhaustion—and ultimately ensure continued employee productivity.

Turnover

To replace employees who leave their job (either voluntarily or involuntarily) organizations need to recruit, select, and train new employees. While turnover can be effective in eliminating unproductive employees, voluntary turnover of productive and qualified employees is detrimental to the functioning of organizations. As a result, many organizations are interested in understanding the factors that lead to voluntary turnover. A large body of research suggests that employees will first develop intention to leave the organization before they actually quit their job. Researchers have identified dissatisfaction with pay, poor relationships with supervisors and coworkers, and decreased autonomy on the job as predictors of employees' intention to leave an organization and, consequently, of turnover. In addition, affective experiences such as emotional exhaustion and affective commitment are linked to turnover intention, with Maertz and Griffeth (2004) suggesting that affect is one the driving forces in voluntary turnover. As such, when employees experience positive emotions on the job, they are more inclined to remain with the organization, whereas those experiencing negative emotions tend to leave.

APPLICATIONS FOR MANAGEMENT PRACTICE

Change Management

By our nature, humans tend to seek balance and control. For example, the human body consists of many systems for maintaining balance, or homeostasis. When people catch a cold, the infection strains their bodies, and they fight back with antibodies, eventually returning to a healthy state. During organizational changes, which include mergers, acquisitions, transformations, downsizing, and organizational restructuring, employees often sense a loss of balance or control and, by nature, they feel stress. With stress, some employees fight back, resisting change, while others adapt and move forward. Change managers play a crucial role in how employees respond to organizational changes. Research has suggested that effective change managers might use affect or emotion to create a sense of dissatisfaction with the current situation, such that employees are then motivated to seek out change and quickly adapt to a new situation. During times of change, managers who create more positive experiences at work are likely to find employees responding with less stress, less intention to leave, and increased affective commitment and job satisfaction.

Leadership Development

Many organizations provide leadership training for both their current leaders and their high potential employees who will eventually be placed in leadership roles. Leadership training covers a variety of topics, including administrative (e.g., strategic planning, time management), personal awareness (e.g., creating executive image, capitalizing on personal strengths), and interpersonal relations (e.g., communication, motivating employees). To build personal awareness, some programs train leaders to recognize their own affective tendencies and manage their emotions effectively (aspects of EI). For example, during times of crisis, successful leaders are often credited for maintaining composure, which is an appropriate display. As such, successful leaders may need to both understand and act on emotional display rules.

Leadership training also enables participants to understand how their emotions impact subordinates. Research investigating emotional contagion demonstrates that a leader's emotions spread to their subordinates, and whether positive or negative, followers tend to adopt the emotional tone of their leader. Therefore, it is essential for leaders to be aware of the emotional undertones they are conveying and of the implications for their followers. Leaders who convey a calm and collected demeanor during crisis have a tendency to spread these sentiments throughout a group, while leaders who respond in panic are likely to provoke confusion and uncertainty. Affective displays can spread throughout a group or can be specific to an employee. In

some situations, such as unexplained frequent tardiness, leaders may exhibit negative emotions (e.g., anger), thus evoking negative emotions in the subordinate (e.g., fear) that increase motivation to arrive on time. Other situations may require more sensitivity or the use of positive emotions. Leaders who understand the affective experiences of their employees are more likely to respond appropriately to their needs in a given situation. Leadership development programs that emphasize raising a leader's awareness of emotions can provide leaders with an advantage in understanding themselves and their employees.

Romance in the Workplace

Attraction, lust, love, and passion are powerful emotions that add new dimensions when experienced between coworkers. Whether a workplace romantic relationship is the beginning of true love or quickly sours, it will certainly impact the couple, as well as their coworkers. This emerging line of research brings attention to romance in the workplace, exploring the intricacies of workplace romance as well as the implications for organizations. Often, workplace romance—and even the perception or impression of a relationship—can lead to gossip among employees (Powell & Foley, 1998). Engaging in gossip distracts employees from their work duties and may provide emotional strain as employees make judgments about the relationship. Because workplace romance introduces the potential for sexual harassment, many proactive organizations are creating workplace romance policies and sometimes have explicit policies forbidding them. Some human resource departments even take the step of asking couples to sign a corporate record, known as a "love contract," to formally establish the beginning and end of their relationship in an effort to manage the legal implications of these relationships.

Selection

Organizations are challenged to select high-performing applicants who are a solid "fit" with the organization. Anecdotally, most would agree that the outgoing salesperson, happy customer service representative, and well-composed police officer are likely to be high performers at work, whereas anxious, careless, and disagreeable employees are likely to evoke unfavorable reactions from supervisors, subordinates, and clients. Others may have experienced a new employee who did not "fit-in" with coworkers or department norms and voluntarily left the organization shortly after they were hired. Yet, selecting the "right" employees involves more than just relying on experience or anecdotal evidence. Employee selection requires careful consideration of applicants through the use of rigorous and validated methodology.

Selection systems often include a battery of assessments, and applicants are screened for cognitive ability, aptitude, skills, past performance, and personality. While cognitive abilities and past performance are key factors in employee selection, research also showed that affective traits can predict employee performance. For example, emotional stability (i.e., low neuroticism, or low NA) is linked with team dynamics, counterproductive work behaviors, and motivation. Employees high in emotional stability tend to function more effectively in teams and report higher levels of motivation, whereas those low in emotional stability exhibit more counterproductive work behaviors. As employee and organizations match each other's interests and goals, employees are likely to experience positive affective states on the job, longer organizational tenure, and career success.

Violence in the Workplace

Although the frequency of violence in the workplace does not match the hyperintensive media coverage of such events, the presence of workplace violence warrants serious examination. Neuman and Baron (1998) presented a model of workplace aggression, which demonstrates how cultural norms and specific events, combined with personality traits, emotions, and cognition, may lead to aggressive behavior. Other studies have supported their rationale, as negative emotions, aggression, and hostility are associated with workplace violence. To prevent workplace violence, Neuman and Baron encouraged managers to create a fair and safe work environment, providing employees with adequate resources (e.g., employee assistance programs, mental health benefits) and training to enhance employees' ability to manage stressful situations and negative emotions.

CROSS CULTURAL ASPECTS OF EMOTIONS

When studying individual differences such as affective experiences, researchers often conduct crosscultural studies. Research findings advance our understanding of basic human nature if a phenomenon occurs in individuals across multiple cultures, given that it exists in diverse environments and societies. For instance, in an international study of U.S. and French service workers, participants reported more job satisfaction and less emotional exhaustion as they were provided more autonomy and freedom at work, despite the well-noted cultural differences between the United States and France (Grandey et al., 2005). Such findings support the idea that humans are happier when they can live the way they choose to, rather than being restricted by outside influences. In the event that a phenomenon does reproduce across cultures, researchers may conclude that environmental factors play a larger role in shaping the phenomenon. One example might come from research showing that employees respond to teamwork differently in collective versus individualistic societies, thus demonstrating the impact of cultural values on individual's perceptions of teamwork.

In an effort to identify whether or not basic emotions are indeed universal cultures, Paul Ekman (2007), a leading researcher in emotion, conducted dozens of crosscultural studies of facial emotional expression. In his research, Ekman asked participants to identify facial expressions demonstrating distinct emotional states (e.g., fear, sadness, joy). Regardless of their culture, participants were able to identify the emotional expressions using the same cues (e.g., smile, facial configuration), suggesting that basic emotions may exist. Therefore, Ekman suggested a set of universal human emotions that includes anger, disgust, fear, joy, sadness, and surprise. While researchers debate on the number of basic emotions and whether or not basic emotions limit the study of emotion, Ekman's work has created widespread interest in understanding the cross-cultural aspects of emotions. For instance, Gelfland, Nishii, and Raver (2006) proposed the strength of societal, organizational, and individual norms (e.g., social behavioral expectations) along with the level of tolerance for breaking the norms will influence organizational outcomes and individual behavior. While this theory has yet to be extensively tested, it offers parameters for studying the relationship between social norms and emotional display rules. Research advancing this theory might explore the impact of emotional display rules and emotional labor in organizational cultures with low tolerance for social norm deviation.

Collectively, cross-cultural research lends to a more comprehensive understanding of human nature, as well as the environmental and social forces that impact human behavior. The findings of cross-cultural research can be used to advance effectiveness in applied settings as well. Managers and employees engaging in cross-cultural exchanges might benefit from increased awareness of cultural differences and variation. In understanding cultural differences, adjustments to interpersonal communication and work practices can be made in effort to build relationships with foreign clients. Because cultural expressions of emotions differ, knowledge of these social norms and appropriate responses may serve to limit the likelihood of miscommunication. Many misunderstandings and conflicts may arise from unintended violations of cultural norms that stem from reliance on ingrained cultural expectations.

Organizations involved in international business exchange often train their employees in the customs, traditions, and social norms of other countries before employees interact with foreign clients. During these training programs, employees learn social norms and etiquette of their clients and may experience emotional labor as they perform appropriate display rules instead of their true emotions. Taking international business exchange to another level, some organizations ask employees to experience total cultural immersion by assigning them to work as expatriates in a foreign country. Research has shown that employees who experience high levels of PA tended to adjust well in a new culture. In contrast, employees who experience more NA often reported difficulty adjusting to their new work

environment and experienced increased thoughts of leaving the organization (Shaffer, Harrison, Gregerson, Black, & Ferzandi, 2006).

While employees make concessions for cross-cultural interactions, adjustments at the organizational level also occur. In the event that organizations move operations into other countries through off-shoring, work functions such as employee training and development, departmental structure, performance evaluation, and reward systems may require adjustments to reduce potential cross-cultural conflicts. These functions might be designed to maximize positive emotional responses within a given culture. For instance, in performance evaluations, managers may adjust their feedback style to fit cultural communication norms as a means of avoiding negative emotional responses. At an organizational level, leaders could consider employees affective responses to reward systems and departmental structure (e.g., degree of collaboration, reporting structure, etc.) as cultural norms may play a role in employee preferences. With technological advancements increasing the ability to communicate with those in other countries, the world is more interconnected. Organizations engaging in international business are increasingly seeing cross-cultural research as a resource for identifying cultural differences in attitudes, norms, and emotions in an effort to improve their business practices.

DIRECTIONS FOR FUTURE RESEARCH

This chapter opened with an overview of the historical hostility that has faced individuals interested in exploring the place of emotion in organizational life. While this is no longer the prevalent attitude among businesses, most do not fully appreciate the powerful roles that emotions have in influencing critical aspects of work (e.g., job performance, creativity, turnover). As findings from current research confirm the relationships between employees' emotions and their behavior in organizations, one thing becomes very clear: The debate is over; emotions are both relevant to effective management, and managers who ignore them do so at their own risk.

While it is clear that emotions are important, there are a number of ways in which future research might increase our understanding of how emotion both influences and is caused by organizational forces. One of the key challenges for managers looking to increase their understanding of emotions in the workplace will be through their need to identify ways in which emotion-relevant aspects of the job are identified. The purpose of a job analysis is to identify job tasks as well as the basic knowledge, skills, and abilities required to accomplish job tasks. Organizations use job analysis as a basis for employee selection and promotion, training program development, and performance evaluation standards. Currently, job analysis techniques focus on job skills and abilities, as well as on tacit knowledge. While

this information is beneficial to managers, incorporating affective experiences into the job analysis might enhance understanding of the nature of specific jobs. Given that some jobs may require certain affective traits and emotions, investigating the involvement of affective experiences for specific job categories may serve several purposes. First, it may provide employers with more comprehensive realistic job previews, outlining the nature of the emotional components of the job for applicants. Second, understanding affective experiences of the job enables organizations to intervene and prevent negative affective experiences such as emotional exhaustion and decreased affective commitment. Finally, organizations might design selection measures to identify characteristics of successful employees (e.g., EI, trait PA, and NA).

Researchers who are interested in investigating emotions in organizations also face a number of key challenges. In particular, the recent theories of emotional processes in activities like job performance challenge our conventional research designs and call for the use of increasingly powerful and sophisticated methodologies and statistics. In particular, AET is suited for exploring the emotional process within individual levels, as well as between individuals. While some limited research has already been done, continued efforts should be made to investigate the cumulative effects of daily work events and hassles on important topics like employee turnover and job performance. These longitudinal studies offer a number of key benefits that are missing from most of our current knowledge—specifically, the ability to understand the individual processes that a specific person experiences as opposed to typical cross-sectional research designs. Additionally, studies examining within-subjects data may reveal a host of relationships that were obscured by between-subjects individual differences and situational features. Although individual level longitudinal research is now feasible, it is still relatively new to most organizational researchers and requires significant investments of time and effort on the part of both the researcher and the study participants. Yet the benefits in terms of increased knowledge easily make the effort worthwhile.

REFERENCES AND FURTHER READINGS

- Ashforth, B. E., & Humphrey, R. H. (1995). Emotion in the workplace: A reappraisal. *Human Relations*, 48(2), 97–125.
- Beal, D. J., Weiss, H. M., Barros, E., & MacDermid, S. M. (2005).
 An episodic process model of affective influences on performance. *Journal of Applied Psychology*, 90(6), 1054–1068.
- Charles, S. T., Reynolds, C. A., & Gatz, M. (2001). Age-related differences and change in positive and negative affect over 23 years. *Journal of Personality and Social Psychology*, 80(1), 136–151.
- Ekman, P. (2007). Understanding facial expression, emotion, and deception: Articles and book chapters by Paul Ekman. Retrieved September 10, 2007, from http://www.paulekman.com/articlesandbookchapters.html

- Fisher, C. (2003). Why do lay people believe that satisfaction and performance are correlated? Possible sources of a commonsense theory. *Journal of Organizational Behavior*, 24(6), 753–777
- Forgas, J. P. (1995). Mood and judgment: The affect infusion model (AIM). *Psychological Bulletin*, 117(1), 39–66.
- Forgas, J. P. (2001). *Handbook of affect and social cognition*. Hillsdale, NJ: Erlbaum.
- Fox, S., & Spector, P. E. (2004). The stressor-emotion model of counterproductive work behavior. In E. A. Locke (Ed.), *Handbook of principles of organizational behavior* (pp. 151–174). Malden, MA: Blackwell Publishing Ltd.
- Gelfand, M. J., Nishii, L. A., & Raver, J. L. (2006). On the importance of cultural tightness-looseness. *Journal of Applied Psychology*, 91(6), 1225–1244.
- George, J. M. (1991). State or trait: Effects of positive mood on prosocial behaviors at work. *Journal of Applied Psychology*, 76(2), 299–307.
- Gibson, F. P., & Fichman, M. (2006). When threats and encouragements are effective in bargaining: The case of credit collectors. *Cognition and Emotion*, 20(8), 1108–1131.
- Goleman, D. (1997). Emotional intelligence: Why it can matter more than IQ. New York: Bantam.
- Grandey, A. A., Fisk, G. M., & Steiner, D. D. (2005). Must service with a smile be stressful? The moderating role of personal control for American and French employees. *Journal of Applied Psychology*, 90(5), 893–904.
- Hersey, R. B. (1932). *Workers emotions in shop and home*. Philadelphia: University of Pennsylvania Press.
- Hochschild, A. R. (1983). The managed heart: Commercialization of human feelings. Berkeley: University of California Press.
- Larsen, R. J., Diener, E., & Lucas, R. E. (2002). Emotion: Models, measures and individual differences. In R. G. Lord, R. J. Klimoski, & R. Kanfer (Eds.), *Emotions in the workplace* (pp. 64–106). San Francisco: Jossey-Bass.
- Lewis, M., & Haviland-Jones, J. M. (2000). *Handbook of emotions* (2nd ed.). New York: Guilford Press.
- Lord, R. G., Klimoski, R. J., & Kanfer, R. (2002). *Emotions in the workplace: Understanding the structure and role of emotions in organizational behavior*. San Francisco: Jossey-Bass.
- Maertz, C. P., Jr., & Griffeth, R. W. (2004). Eight motivational forces and voluntary turnover: A theoretical synthesis with implications for research. *Journal of Management*, 30(5), 667–683.
- Mayer, J. D., & Salovey, P. (1997). What is emotional intelligence? In P. Salovey & D. Sluyter (Eds.), *Emotional development and emotional intelligence education Implications* for educators (pp. 3–31). New York: Basic Books.
- Neuman, J. H., & Baron, R. A. (1998). Workplace violence and workplace aggression: Evidence concerning specific forms, potential causes, and preferred targets. *Journal of Management*, 24(3), 391–419.
- Pinder, C. C. (1998). *Work motivation in organizational behavior*. Upper Saddle River, NJ: Prentice Hall.
- Plutchik, R., & Conte, H. R. (1997). Circumplex models of personality and emotions. Washington, DC: American Psychological Association.
- Powell, G. N., & Foley, S. (1998). Something to talk about: Romantic relationships in organizational settings. *Journal of Management*, 24(3), 421–448.

- Rubin, R. S., Munz, D. C., & Bommer, W. H. (2005). Leading from within: The effects of emotional regulation and personality on transformational leadership behavior. *Academy of Management Journal*, 48(5), 845–858.
- Russell, J. A. (1997). How shall an emotion be called? In R. Plutchik & H. R. Conte (Eds.), *Circumplex models of personality and emotions* (pp. 205–220). Washington, DC: American Psychological Association.
- Salovey, P., & Mayer, J. D. (1990). Emotional intelligence. *Imagination, Cognition, and Personality*, 9(3), 185–211.
- Shaffer, M. A., Harrison, D. A., Gregersen, H., Black, J. S., & Ferzandi, L. A. (2006). You can take it with you: Individual differences and expatriate effectiveness. *Journal of Applied Psychology*, *91*(1), 109–125.
- Seo, M., Barrett, L. F., & Bartunek, J. M. (2004). The role of affective experience in work motivation. *Academy of Management Review*, 29(3), 423–439.
- Tett, R. P., Fox, K. E., & Wang, A. (2005). Development and validation of a self-report measure of emotional intelligence as a multidimensional trait domain. *Personality and Social Psychology Bulletin*, *31*(7), 859–888.
- Thoresen, C. J., Kaplan, S. E., Barsky, A. P., Warren, C. R., & de Chermont, K. (2003). The affective underpinnings of job perceptions and attitudes: A meta-analytic review and integration. *Psychological Bulletin*, *129*(6), 914–945.
- Watson, D. (2000). *Mood and temperament*. New York: Guilford. Watson, D., & Tellegen, A. (1985). Toward a consensual structure of mood. *Psychological Bulletin*, *98*(2), 219–235.

- Watson, D., Wiese, D., Vaidya, J., & Tellegen, A. (1999). The two general activation systems of affect: Structural findings, evolutionary considerations, and psychobiological evidence. *Journal of Personality and Social Psychology*, 76(5), 820–838.
- Weiss, H. M. (2002). Conceptual and empirical foundations for the study of affect at work. In R. G. Lord, R. J. Klimoski, & R. Kanfer (Eds.), *Emotion in the workplace: Understanding the structure and role of emotions in organizational behavior*. (pp. 20–63). San Francisco: Jossey-Bass.
- Weiss, H. M., & Cropanzano, R. (1996). Affective events theory: A theoretical discussion of the structure, causes and consequences of affective experiences at work. In B. M. Staw & L. L. Cummings (Eds.), Research in Organizational Behavior, 18, 1–74.
- Wong, C., & Law, K. S. (2002). The effects of leader and follower emotional intelligence on performance and attitude: An exploratory study. *The Leadership Quarterly*, *13*(3), 243–274.

CROSS-REFERENCES

Aging and Work Motivation (66)

Motivating Individuals and Groups at Work in the 21st Century (68) Understanding and Managing Misbehavior in Organizations (72) Leadership Style: Developing a Leadership Style to Fit 21st-Century Challenges (77)

Managing Creativity and Innovation in the 21st Century (94)

PART XII

Leadership Without Boundaries

LEADERSHIP STYLE

Developing a Leadership Style to Fit 21st-Century Challenges

Dail Fields

Regent University

here may be nearly as many different definitions and perspectives about leadership as there are people who study and write about it. As leadership has been a subject of study during the past 40 years, a realization has emerged that a single leadership approach will not be effective in all situations. While this may seem obvious to some, it represents a breakthrough in the way that leadership has characteristically been discussed by researchers, consultants, and trainers. The need to select or develop a leadership approach to meet the needs of an organization and its environment suggests that a critical leadership skill may be the ability to understand what fits of a particular situation. This is particularly true for organizations needing to meet changing social, economic, and technological changes. Understanding the critical aspects of organizational change and having knowledge of alternative leadership models are both necessary to effectively deal with the organizational challenges of the 21st century.

Starting from this perspective, this chapter first briefly examines major challenges facing contemporary organizations, then reviews a number of alternative ways of looking at leadership in organizations, and finally considers some specific leadership requirements presented by change and globalization, the two largest organizational challenges of this century.

ORGANIZATIONAL CHALLENGES

Some management researchers and authors see the 21st century in terms of conflicts between groups with competing interests. For example, some point to the growing gap between affluent and poor groups as a source of continued unrest and possible challenge for organizations. While disparities in wealth have always been present, technological changes have made differences more visible than ever, possibly fueling new levels of unrest (Starbuck, 2005). Other conflicts may exist between organizations and nations, as large for-profit and nonprofit entities extend presence and influence across national boundaries, often tying employees more tightly to the organizations than to their home country. Indeed, the revenues of Fortune 500 companies are larger than numerous national budgets. The influence of these organizations may be further augmented by continued globalization of markets and the outsourcing of work and services in other parts of the world.

The challenge of change and globalization require leadership that can

 adopt new technologies and alter business processes and employee/manager roles to make effective use of technologies;

- develop new perspectives about the nature of the business objectives and goals of the organization;
- develop perspectives about the nature of the calling of the organization and its role in society. Social responsibility is not just an "add-on." Successful organizations must have a vision for the role and contribution to making the world a better place;
- make products and services attractive to customers in different cultures; and
- work effectively with members of different cultures as fellow employees, providers of outsourced services, or as venture partners.

Guiding change may be the ultimate test of a leader, since evidence suggests that few organizations will survive over the long term without it. However, fundamental organizational change is often resisted mightily. Thus, effective leaders in the 21st century need to be aware of alternative approaches to leadership and the implications of these models for different contexts and needs.

ALTERNATIVE LEADERSHIP MODELS

Personal Characteristics

Systematic research concerned with leadership first focused on the search for individual characteristics that universally differentiated leaders from nonleaders. A large number of personal characteristics were investigated such as gender, height, physical energy, and appearance as well as psychological traits and motives such as authoritarianism, intelligence, need for achievement, and need for power. The dominant part of this literature was published between 1930 and 1950. This work identified several traits that were associated with measures of leader effectiveness, but the findings were seldom replicated in multiple studies. Thus it appeared that there were few, if any, universal traits associated with effective leadership.

In the early 1970s, interest in leadership traits reemerged. For example, people who are good at monitoring their own actions (called high self-monitors) are more responsive to situational cues and may alter their behaviors to meet circumstances. In contrast, low self-monitors are more likely to act consistently across all situations, making their personal characteristics more salient and visible. In addition, individual traits dispositions may be less visible and important predictors of leadership effectiveness in highly constraining "strong" situations. Individual dispositions are more likely to predict leadership in "weaker" situations. Strong situations are cases that are highly formalized and governed by well-established role expectations, norms, rules, policies, and procedures—such as the military. In these cases, there is less opportunity for individual traits to have an effect. Traits are more predictive of a leader's behavior in select situations. Thus, an individual who is disposed toward aggressiveness is more likely to behave in an aggressive manner in situations in which others disagree with or threaten the individual. In other words, the tendency to be aggressive becomes significant only under aggression-arousing conditions. In other situations, individuals with an aggressive disposition are not likely to behave more aggressively than others.

Achievement-motivated individuals set challenging goals, assume personal responsibility for goal accomplishment, are highly persistent in the pursuit of goals, take calculated risks to achieve goals, and actively collect and use information for feedback. High-achievement motivated individuals also engage in a high degree of self-regulatory behavior. However, in management positions at middle or higher levels, managerial effectiveness often depends on the extent to which managers delegate effectively and motivate and coordinate others. High-achievement motivated managers are strongly inclined to be personally involved in performing the work of their organization and are reluctant to delegate authority and responsibility. Thus, achievement motivation has been found to be positively related to the effectiveness of leaders of small task-oriented groups and leaders of relatively small entrepreneurial firms, but negatively related to the effectiveness of middle- and high-level managers in large organizations or in political situations.

Unless constrained by a disposition to use power in a constructive manner, power-motivated managers will exercise power in an impetuously aggressive manner for self-aggrandizing purposes to the detriment of their subordinates and organizations. Accordingly, individuals who have a high concern for the moral exercise of power will use power in an altruistic and collectively oriented manner, behave ethically, and be concerned about the consequences of their actions on others. A leader who exhibits a combination of high power motivation and high regard for the moral exercise of power generates follower trust and respect. On the other hand, high-affiliation motivated managers may be reluctant to give negative feedback to subordinates even when required, or to discipline subordinates for ethical transgressions or violations of organizational policies.

To be effective, charismatic leaders must mobilize a critical mass of followers in the interest of the leader's vision; thus they need to have high-power motivation. These leaders will almost inevitably be resisted and criticized; they need to be relatively insensitive to such criticism and, thus, must have lower affiliation motivation. Finally, to maintain their position, charismatic leaders must advocate a vision of a better future for the collective (social system or organization) and for followers. They must not exercise leadership in the interest of self-aggrandizement. According to charismatic theory, the emergence and effectiveness of charismatic leaders will be associated with leaders' sense of social responsibility and collective interests rather than with self-interest. Thus, for successful leadership, the power motive needs to be higher than the affiliation motive. When the self-aggrandizing tendency usually associated with high-power motivation is inhibited by a high concern for morally responsible exercise of power (or social influence),

274 • LEADERSHIP WITHOUT BOUNDARIES

individuals are predicted to engage in the exercise of power in an effective and socially desirable manner. This combination has been found to predict managerial effectiveness in formal organizations at middle and higher organizational levels, in nontechnical functions, as well as in small entrepreneurial organizations.

Leader Behaviors

The guiding assumption of the behavioral perspective on leadership was that some leader behaviors seem to work well regardless of the leader's traits. These behaviors could be discovered by either observing leaders in action or by asking subordinates about the behavior of their immediate superiors. The behavioral leadership theories include several models, the major ones are as follows:

- The path-goal theory suggests that a leader's success is determined by his or her ability to provide followers with direction (the path) to follow to achieve performance goals. The theory assumes that followers must be able to make relatively confident and accurate estimates of probabilities of goal accomplishment (performance) and receipt of rewards after such accomplishment. When there is uncertainty with respect to effort requirements, goals, or extrinsic rewards, or when followers or leaders are under a substantial amount of stress, the rational processes suggested by path-goal theory may not hold.
- Hersey and Blanchard (1982) suggested four leadership styles: telling, selling, participating, and delegating, each appropriate for certain kinds of situations defined by subordinates' "maturity" levels. That is, the prescribed leadership style is contingent on follower maturity, defined as "the degree to which followers are ready and willing to tackle the task facing the group." This is represented by a life cycle model, analogous to a parent-child relationship where the parent gradually relinquishes control as the child matures.
- Transactional and transformational leadership models cover a range of possible relationships between leaders and followers. The transactional leader-follower relationship is based on an exchange model, where the follower makes contributions in anticipation of, or in response to, rewards, support, and various accommodations from the leader. Typical transactional leadership behaviors are the clarification of task requirements and specification of contingent rewards.
- Transformational leadership involves behaviors designed
 to develop followers' strong personal identification with
 the leader and a shared vision of the future. These results
 in followers' attitudes and behaviors that go above and beyond those linked to an exchange of rewards or compliance.
 Transformational leaders activate the higher order needs
 of followers, getting subordinates to think and act for the
 sake of the organization, often by making these employees
 more aware of the importance and interdependence of their
 efforts. Transformational leadership behaviors include:

- intellectual stimulation (helping followers think about problems in new ways);
- inspirational motivation (communicating images of what the followers can do);
- individualized consideration (giving personalized feedback for development); and
- idealized influence (having charismatic appeal to followers).

Although transactional and transformational leadership approaches seem to be conceptually distinct, several studies have examined the question of whether subordinates can tell the difference. Some studies have found that subordinates seem to differentiate transactional and transformational behaviors on the part of their leaders, where others have found that subordinates may not distinguish between the two concepts.

- As with trait research, models of leadership behaviors seemed to make little distinction among the specific role demands of leaders, the context in which they functioned, or differences in dispositions of leaders or followers. In response to this omission, contingency theory suggests that a leader's task versus relationship behaviors combine with "situational control" to predict leader success. Situational control is the degree to which the leader can control and influence the group process. In general, studies have found that task-motivated leaders perform best in situations of high and low control while relationship-motivated leaders perform best in moderate control situations.
- Cognitive resource theory focuses on the effects of leader intelligence and experience, and the amount of stress present in the situation. One of the most important findings from studies of this perspective is that under different stress levels, leader and follower intelligence and experience levels have different relationships with performance. That is, when subordinates report high job- or boss-related stress, bright people perform worse than dull people. When job- or boss-related stress is low, more experienced individuals perform worse than less experienced individuals. This implies that under conditions of high stress, a highly intelligent person should rely on experience, rather than intelligence, to be effective. Intelligence and experience, thus, interfere with each other. While counterintuitive, these results have been empirically supported in a number of studies.

Cognitive resource theory has also helped to answer the leadership puzzle of when it is more effective to be participative with followers, and when it is more effective to be directive. Leader intelligence cannot contribute to group performance unless the leader tells the group what to do, and the group members listen to the leader and do what they are told to do. When the leader has little control over the behavior of followers and leader-follower relationships are troublesome, neither directive nor participative leadership will be effective, because followers will neither listen

to the leader, nor do what they are told to do. When leader intelligence is lacking in low-stress conditions or leader experience is lacking in high-stress conditions, directive leadership will be ineffective. Further, when leader-follower relationships are good and stress is low, participative leadership will work best when group members are more intelligent than their leader. That is, relationships being good, the leader will listen to the followers.

Fiedler (1996) recommends a two-step process of (a) recruiting and selecting individuals with required intellectual abilities, experience, and job-relevant knowledge, and (b) enabling leaders to work under conditions that allow them to make effective use of the cognitive resources for which they were hired. For inherently stressful tasks such as firefighting or combat performance, overlearning is recommended. For stressful jobs that require both experience and intelligence, such as directing air traffic from control towers, overlearning and stress-reduction procedures as well as training in coping with stress are recommended.

Leader-Follower Exchange

While the models just discussed tend to describe relationships of leaders with groups of followers, leadermember exchange (LMX) theory suggests that leadership can best be described in terms of the development of the dyadic relationship between a leader and a subordinate. One distinguishing feature of LMX theory is its focus on an individual leader-follower relationship, as opposed to behavior or traits of either followers or leaders. This view suggests that the quality of "mature" superior-subordinate relationships would be more predictive of positive organizational outcomes than "average" traits or behaviors of leaders. The differences in dyadic relationships of followers with the same leader suggest that there may be in-groups and out-groups of followers. LMX may be a better indication of the nature of the superior-subordinate relationship than the performance of followers relative to objectives. Contextual variables also may come into play as high levels of time pressure in a work setting seem to encourage supervisors to form uniformly high LMX relationships with the subordinates in their units. Thinking through the LMX process does help explain some phenomena that are readily observed in organizations. For example, consider the following:

- For several possible reasons, subordinates and superiors may develop high-quality LMX. The reasons could include demographic or perceived similarity, familiarity, liking, reputation of subordinates, social reciprocity, subordinates' ability level, and/or prior performance.
- Superiors then express positive attitudes such as trust and respect toward these subordinates. Superiors also express that they expect a high level of mutual support and loyalty. These communications convey expectations of follower loyalty, commitment, mutual obligation, and possibly mutual liking and may induce a Pygmalion effect. That is, leaders

- grow to like selected subordinates who demonstrate loyalty, commitment, and possibly higher performance and subsequently give these followers higher performance ratings.
- These ratings in turn influence the subordinate's reputation, become a matter of record, and may be used for future selection, development, and promotion decisions. Thus, subordinates with a history of high-performance ratings become promoted to higher level positions.

The downside of this process is possible adverse implications for the development and career advancement of subordinates who are not demographically similar, familiar, and well liked. The previous scenario describes a naturally occurring process and does not necessarily imply biased treatment of minorities, although it can describe a process by which discrimination can occur. In that respect, the LMX process may be one through which leaders must be conscientious of fair treatment in reward allocations, even though it is human nature to like some subordinates better than others.

Having discussed a range of alternative ways of considering, describing, and evaluating leadership, we now turn to consideration of the specific aspects or leadership required for the challenges of globalization and organizational change in the 21st century.

Globalization: Leadership Across Cultures

The recently published results of the Global Leadership and Organizational Behavior Effectiveness (GLOBE) study present information about how leadership may be viewed by persons from 62 different cultures. This study proceeded from the perspective that the way in which a leader's characteristics and behaviors are interpreted is strongly influenced by a person's cultural background. Thus, the attributes that are seen as characteristic or prototypical for leaders may also strongly vary in different cultures. It is important to realize that most of the research on leadership during the past half century was conducted in the United States, in Canada, and in Western Europe. Thus, one of the criteria that should be considered in evaluating the applicability of leadership models previously discussed is a model's flexibility in accommodating alternative cultural perspectives.

The GLOBE study identified both universally endorsed leadership attributes, as well as the leadership features that seem to be endorsed only in selected cultures. Contributing to outstanding leadership in all cultures were several attributes reflecting integrity. Thus, a leader who is viewed as trustworthy, just, and honest is positively regarded in nearly all cultures. Also, an outstanding leader has other attributes reflecting charismatic, inspirational, and visionary leadership. A leader who embodies these *universally endorsed* attributes is encouraging, positive, motivational, and dynamic and builds confidence and has foresight. A universally endorsed leader is also a team builder, a good

communicator and coordinator, achieves excellence, and is decisive, intelligent, and a win-win problem solver. Leader attributes that are universally viewed as *impediments* to outstanding leadership include being a loner, being uncooperative, ruthless, nonexplicit, irritable, and dictatorial.

Perhaps most informative are examples collected by the GLOBE researchers as to how different leadership approaches may be enacted in different cultural settings. Some examples are as follows:

- Charisma—The term "charisma" invokes ambivalence in several countries. For instance, in Mexico, charisma is seen as a mixed blessing. Negative evaluations of charisma are also found in several other countries. For instance, some fear that people may lose their balance and perspective due to the focus on achievement created by charismatic leaders. Followers might willingly exploit themselves—with negative consequences for their health and quality of life—in the service of the organization's mission.
- Communication—Communication of a leader's vision is
 often associated with powerful rhetoric. However, there
 are different ways to communicate a vision. For example,
 a vision in China is normally expressed in a nonaggressive manner, possibly due to the influences of Confucian
 values (e.g., kindness, benevolence) that make people wary
 of leaders making pompous speeches without engaging in
 specific action. In India, bold, assertive leadership styles
 are generally preferred to quiet and nurturing styles.
- Egalitarianism—In countries such as the Netherlands and Australia, a high value is placed on egalitarianism, and this is reflected in remarks by Dutch CEOs such as "ideas need acceptance, otherwise they will not be realized" and "consensus is an important prerequisite to realize goals." In the Netherlands, participative leadership can be seen as a component of transformational leadership. In both the Netherlands and Australia, there is a tendency to denigrate high achievers. This is sometimes referred to as the "tall poppy syndrome" (to cut down the tall poppy that absorbs the sun while depriving the shorter poppies of exposure to the sun). Australian leaders are expected to inspire high levels of performance, but must do so without giving the impression of charisma or of not being anything more than "a mate." The leader being "one of the boys" was one of the typically Australian leadership dimensions that reflect the high value placed on egalitarianism.
- Compassion in leadership—A Mexican entrepreneur who was considered brilliant, humorous, enthusiastic, and a good speaker involved himself in the private lives of his employees because of his perceived role in meeting their personal needs and expectations of him. For example, when informed that a secretary's husband was going into the hospital for an operation, the leader called the doctor and discussed the matter with the doctor to make sure that the operation was legitimate. A Chinese manager may have high respect for his boss because "he does real things" such as visiting an employee's sick family member and telling the employee to stay at the hospital rather then appearing at work.

These examples provide some insight into the cultural differences that leaders in organizations involved in the global, "flat-world" economy must be ready to consider in their choice of actions.

ALTERNATIVE APPROACHES TO LEADERSHIP OF ORGANIZATIONAL CHANGE

The classic role of managers in an organization is to establish and enforce the use of policies, procedures, and methods that reduce uncertainty in organizational outputs and outcomes. Indeed, the bureaucratic routines adopted by organizations increase predictability, reduce uncertainty within organizations, and "get everyone on the same page." However, the need for organizational change is often rooted in threats or uncertainties. These threats may be due to poor firm performance or trends that suggest the organization is vulnerable to loss of market share, competitive advantages, or critical resources. Some studies of change suggest that organizations may experience periods of equilibrium where patterns of behavior are stable. In periods of equilibrium, any changes made by the organization may be incremental and aimed at better aligning and maintaining the current congruence among system components. These have also been described as "first-level" changes, which do not alter organizational relationships, but are aimed at incremental improvement within the existing structure and task design.

Strategic organizational changes raise questions about the organization's purpose and identity and have been described as second-level changes. These are often interventions that involve reorganization and/or major alteration of one or more selected subsystems. Third-level changes are organizationwide efforts that involve altering the beliefs, values, and interrelationships of all subsystems of the organization. Second- and third-level changes are most frequently undertaken as planned changes. In planned changes, managers seek involvement and commitment of organizational members in planning and specifying the nature of the changes. Employee "buy-in" is sought in part to mitigate resistance and reduce process losses. The underlying assumption in planned change is that organizational inertia needs to be disturbed by deliberate efforts to change aspects of an organization.

The type of change appropriate for an organization depends on both business complexity and sociotechnical uncertainty. Business complexity includes the extent of differentiation of the organization, organization size and geographical dispersion, interdependencies among functions, number of products and services offered, and diversity of technologies employed. Greater complexity increases the number of stakeholders who must be involved in a change and the range of consequences that must be anticipated. Sociotechnical uncertainty is defined as the extent to which there are clearly known ways to approach problems and established procedures and job roles. Higher levels of

sociotechnical uncertainty imply that outcomes are less certain. When complexity and sociotechnical uncertainties are greater, firms may be more likely to engage in planned changes. Planned organizational changes have had the most consistent effects on organizational work settings, including coordination and control of work, reward system, social interactions, organizational culture, and technology. Planned interventions also significantly impacted individual employee behavior (including job performance, effort, open communication, collaboration, and organizational citizenship behaviors,) and organizational outcomes (including profits, market share, market position, productivity, rates of turnover, absenteeism, and grievances).

The most effective leadership approaches for change have involved behaviors directed at (a) framing change (establishing starting points for change; designing and managing the change journey for employees, and communicating guiding principles) and (b) building capacity (creating individual and organizational capacities for different job roles; communicating and creating connections among functions and the related changes). Organizations tended to adopt emergent change approaches only after completing a process of planned change. Centrally directed changes based on assumptions of linearity (the "freeze-mobilize-refreeze" model) are least likely to succeed. Studies have also found that visible management support and commitment, realistic schedules, adequate resources, employee participation, high levels of communication, agreement on the business need for the change, and reward systems that support change all contribute to successful change implementation. The factors negatively affecting change include inconsistent actions by key managers, unrealistic expectations, lack of meaningful employee participation, poor communication, unclear purpose for change, and lack of clear responsibility for decisions.

In general, successful change seems to require greater levels of collaboration among different levels and functions within an organization. However, significant organizational changes may involve some loss by individuals within the organization. For example, employees may be asked to take on new roles that they may perceive as being less important than old roles. Change implementation may vary in its impact on different job levels and types, where employees in jobs over which the employee had more control may be more ready for organizational change and willing to participate in redesign tasks while workers who may be less engaged in their jobs may be less willing to participate in redesign activities. Productivity may drop during periods of significant organizational change because stability and routines are disrupted. Successful implementation of planned changes may require the establishment of a separate process within the organization that combines key factors for change. Other studies have directed attention to (a) willingness and ability of "change makers"—on multiple levels to take on responsibility for changes; (b) the extent of the organization's infrastructure to facilitate change; and (c) the availability of sufficient resources to undertake the changes. Change capacity may be related to the extent that the organization has decentralized structures and communication processes in place to facilitate communication and clarification of the intentions and details of changes.

A growing realization is that the inertia within managerial cognition plays a large role in the successful design, planning, and implementation of organizational changes. For example, second- and third-level changes involve changing schema used by managers when thinking about an organization. Thus, successful design and implementation of significant planned changes requires leaders to identify the underlying assumptions they use to interpret and make sense of the organizational world. Well-developed interpretive schemes that have previously provided order and meaning to the workplace may now hinder a management team's visualization of alternatives and limit the consideration of new approaches. Strategic changes are most often successful when substantial changes have taken place in the cognitions of top managers. Often declining organizational performance triggered these changes in cognitions, possibly because declines in performance were salient and demanded corrective actions. The cognitive "road map" including the knowledge structures, beliefs, and causal beliefs of the managerial group in the organization largely determines the way in which an organization's external environment is interpreted. When organizations put mechanisms into place to increase information use, managers are more likely to interpret strategic issues in a positive frame. When managers attribute declining performance to internal characteristics or causes, they are more likely to initiate and undertake strategic changes.

Successful change may depend on leaders developing the capacity to live with and tolerate ambiguity. This includes remaining content with less-than-complete knowledge, resisting the impulse to react to pressures that may be associated with uncertainties encountered in planning and carrying out change (French, 2001). Effective change management requires leaders to be in touch with what is actually happening as opposed to what was planned. When managers and employees cannot tolerate the impact of uncertainties, the coping process may be to "disperse" or race into actions such as breaking problems into manageable bits so that the problems or uncertainties seem to be more bearable. In these instances, individuals and groups close off information, seeking to move in a direction that involves the practiced actions and ways of looking at organizational and operational problems.

Two psychological biases can affect leadership during organizational change. The first, prospect bias, predicts that decision makers are risk averse when performance is perceived to be good and risk seeking when performance has been poor. In other words, managers in firms with poor performance may be motivated to take greater risks than those in more healthy firms. In contrast, the threat-rigidity bias suggests that poor performance promotes risk-averse responses, because threats arouse stress and anxiety in

278 • LEADERSHIP WITHOUT BOUNDARIES

decision makers. The threat-rigidity perspective predicts that managerial anxiety may cause decision makers to narrow their range of attention and restrict information seeking and processing. This restricts alternatives to those consistent with conservative and well-learned interpretive frames. While prospect theory predicts a proactive solution to unfavorable conditions, threat rigidity suggests the continuance of existing strategic orientations. Examples of threat-rigidity bias in leadership of change include focusing on short-term fixes while not attending sufficiently to strategic changes; increased centralization of authority within the organization; downsizing by exiting lines of business and liquidating or divesting subunits; and increasing the relative presence of top managers with legal, financial, or accounting expertise as opposed to marketing, research and development (R&D), and production backgrounds. These overarching decision biases may reflect embedded patterns of managerial cognition that can threaten stakeholder interest in organizations facing the need to change.

Other major cognitive biases may influence managers' perceptions of the need for organizational change and the type of changes that may be effective for the organization. The possible cognitive traps include the following:

- Failure to consider possible consequences. In making complex choices, people often simplify the decision by ignoring possible outcomes or consequences that would otherwise complicate the choice. There is a tendency to reduce the set of possible consequences or outcomes to make the decision more manageable.
- Limiting the range of stakeholders. When there is a tendency to restrict the analysis of a policy's consequences to one or two groups of visible stakeholders, decisions may be blind-sided by unanticipated consequences to an altogether different group.
- Discounting the future. The consequences that managers
 must face tomorrow are more compelling than those occurring next week or next year. Failing to cope with the
 temporal distribution of consequences exposes executives
 and boards to accusations that they squandered the future
 to exploit the present.
- Judgment of risk. What people want to hear is not what might happen, but what will happen. When leaders view the world as more certain than it is, they expose themselves and organizations to poor outcomes. In general, people underestimate the importance of chance or misperceive chance events. For example, each morning, the media presents an "explanation" in the financial pages of why the market went up or down.
- Ignoring low-probability events. If a new product has the
 potential for great acceptance but a possible drawback,
 perhaps for only a few people, there is a tendency to underestimate the risk. One common response to the assertion
 that executives underestimate the importance of random
 events is that they have learned through experience how
 to process information about uncertainty. However, ex-

- perience may not be a good teacher because people often misremember what the original expectations were. This phenomenon, called the "hindsight bias," insulates leaders from previous errors.
- Risk framing. Whether a glass is half full or half empty is a
 matter of risk framing. When the glass is described as half
 full, it appears more attractive than when it is described as
 half empty.
- Perception of causes. Managers may oversimplify assessments of why things happen or do not happen. However, even under the best of circumstances, causation is usually complex, and ambiguity about causation is often at the heart of disputes about responsibility, blame, and punishment. If executives are overconfident, they will fail to seek additional information to update their knowledge and be reluctant to learn more about a situation or problem before acting.

John Kotter, a now retired professor from Harvard Business School, has suggested that the most critical task in organizations is leadership of change. Leading changes successfully requires realizing that the process goes through a series of phases that, in total, usually require a considerable length of time. Skipping steps creates only the illusion of speed and never produces a satisfying result. Critical mistakes in any of the phases can have a devastating impact, slowing change momentum. The most common change leadership errors to be avoided are the following:

- Not establishing a great enough sense of urgency. Most successful change efforts begin when some individuals or groups look hard at a company's competitive situation, market position, technological trends, and financial performance. They focus on the potential impact of impending events that everyone seems to be ignoring. The group finds ways to communicate this information broadly and dramatically, so that potential crises or great opportunities are clear. Without motivation, people will not help, and the effort goes nowhere. Compared with other steps in the change process, phase one can sound easy. However, sometimes leaders underestimate how hard it can be to drive people out of their comfort zones. Sometimes they grossly overestimate how successful they have already been in increasing urgency. Sometimes they lack patience: In many cases, executives become paralyzed by the downside possibilities. They worry that employees with seniority will become defensive, morale will drop, events will spin out of control, short-term business results will be jeopardized, the stock will sink, and they will be blamed for creating a crisis. Bad business results are both a blessing and a curse in this first phase. On the positive side, losing money does catch people's attention, but it also gives less maneuvering room. With good business results, the opposite is true: Convincing people of the need for change is much harder, but you have more resources to help make changes.
- Not creating a powerful enough guiding coalition. While some change efforts start with just one or two people, the

- leadership coalition must grow over time for the change to be successfully implemented. It is often said that major change is impossible unless the head of the organization is an active supporter. The guiding coalition tends to operate outside the normal hierarchy. This can be awkward, but it is clearly necessary because if the existing hierarchy were working well, there would be no need for a major transformation. Companies that fail in this phase may underestimate the difficulties of producing change and thus the importance of a powerful guiding coalition. Efforts that do not have a powerful enough guiding coalition can make apparent progress for a while. Sooner or later, however, the opposition gathers itself together and stops the change.
- Lacking a vision. In every successful transformation effort the guiding coalition develops a picture of the future that is relatively easy to communicate and appeals to customers, stockholders, and employees. A vision says something that helps clarify the direction in which an organization needs to move. Eventually, a strategy for achieving that vision is also developed. Without a sensible vision, a transformation effort can easily dissolve into a list of confusing and incompatible projects that can take the organization in the wrong direction or nowhere at all. In failed transformations, you often find plenty of plans, directives, and programs but no vision. In one case, a company gave out 4-inch-thick notebooks describing its change effort. In mind-numbing detail, the books spelled out procedures, goals, methods, and deadlines. But nowhere was there a clear and compelling statement of where all this was leading. Not surprisingly, most of the employees were either confused or alienated.
- Undercommunicating. Transformation is impossible unless lots of people are willing to help, often to the point of making short-term sacrifices. Employees will not make sacrifices, even if they are unhappy with the status quo, unless they believe that useful change is possible. Without credible communication from leadership, the hearts and minds of the troops are never captured. This phase is particularly challenging if the short-term sacrifices include job losses. Gaining understanding and support is tough when downsizing is part of the vision. For this reason, successful visions usually include new growth possibilities and the commitment to treat fairly anyone who is laid off. In successful transformation efforts, leaders use all existing communication channels to broadcast the vision. They turn boring, unread company newsletters into lively articles about the vision. They take ritualistic, tedious quarterly management meetings and turn them into exciting discussions of the transformation. They throw out much of the company's generic management education and replace it with courses that focus on business problems and the new vision. Even more important, leaders of change must learn to "walk the talk." They consciously attempt to become a living symbol of the new corporate culture. Nothing undermines change more than behavior by important individuals that is inconsistent with their words.

- Not removing obstacles. Communication is never sufficient by itself. Leading renewal also requires the removal of obstacles. Too often, an employee understands the new vision and wants to help make it happen, but an elephant appears to be blocking the path. In many cases, the blockers are very real. However, sometimes the obstacle is the organizational structure: Narrow job categories can seriously undermine efforts to increase productivity or make it very difficult even to think about customers. Sometimes compensation or performance-appraisal systems make people choose between the new vision and their own self-interest. Perhaps worst of all are bosses who refuse to change and who make demands that are inconsistent with the overall effort. If the blocker is a person, it is important that the leader treat this person fairly and in a way that is consistent with the new vision. However, leadership action to remove obstacles is essential both to empower others and to maintain the credibility of the change effort as a whole.
- Not creating short-term wins. Real transformation takes time, and a renewal effort risks losing momentum if there are no short-term goals to meet and celebrate. Creating short-term wins is different from hoping for short-term wins. In a successful transformation, leaders actively look for ways to obtain clear performance improvements, establish goals in the yearly planning system, achieve the objectives, and reward the people involved. Commitments to produce short-term wins help keep the urgency level up and force detailed analytical thinking that can clarify or revise visions.
- Declaring victory too soon. After a period of hard work, it is tempting to declare victory with the first clear performance improvement. While celebrating a win is fine, declaring the war won can be catastrophic. Until changes sink deeply into a company's culture, a process that can take 5 to 10 years, new approaches are fragile. A premature victory celebration can kill momentum and allow powerful forces associated with tradition to take over. Instead of declaring victory, leaders of successful efforts use the credibility afforded by short-term wins to tackle even bigger problems. They go after systems and structures that are not consistent with the transformation vision and have not been confronted before.
- Not anchoring changes in the corporation's culture. In the final analysis, change sticks when it becomes "the way we do things around here," when it seeps into the bloodstream of the corporate body. Until new behaviors are rooted in social norms and shared values, they are subject to degradation as soon as the pressure for change is removed. Change leaders need to consciously show people how the new approaches, behaviors, and attitudes have helped improve performance. When people are left on their own to make the connections, they sometimes create very inaccurate links. Helping people see the right connections requires communication. It is also important to make sure that the next generation of top management really does personify the new approach.

CONCLUSION

This chapter has endeavored to provide the grounding needed to understand and undertake the leadership challenges facing organizations in the 21st century. The first major organizational challenges for the foreseeable future in this century are globalization of organizational membership. Globalization of organizations may be associated with markets, production alternatives, service operations, venture partnerships, and/or strategic linkages. The forces of globalization combined with the growth and expansions of new technologies suggest that the second most significant organizational need is the capacity to undertake change. The effective leadership of change requires leaders who are aware of their own characteristics, are conscious of how followers may perceive certain behaviors, and are sensitive to the cultural differences and similarities. The discussion of alternative leadership approaches provides exposure to a range of approaches that organizational leaders should consider when strategically assessing the needs of 21st-century dynamics. The leadership implications of particular traits invite the reader to "know thyself." Alternative behavioral models provide strategic choices. The discussion of LMX development provides a look at some of the processes by which leader-follower roles are defined and relationships are established. Finally, a review of the requirements for leading successful organizational change and the pitfalls to be avoided in this process present criteria to consider when taking on the leadership challenge in this demanding but exciting time.

REFERENCES AND FURTHER READINGS

- Bass, B. M. (1985). Leadership and performance beyond expectations. New York: Free Press.
- Bass, B. M. (1990). Bass and Stogdill's handbook of leadership: Theory, research and managerial applications (3rd ed.). New York: Free Press.
- Bryman, A. (1992). *Charisma and leadership in organizations*. London: Sage.
- Burns, J. M. (1978). Leadership. New York: Harper & Row.
- Cooper, C. L. (2005). (Ed.). Leadership and management in the 21st century: Business challenges of the future. New York: Oxford University Press.

- Den Hartog, D. N., House, R. J., Hanges, P. J., Ruiz-Quintanilla, R. A., & Dorfman, P. W. (1999). Culture specific and cross-culturally generalizable implicit leadership theories: Are attributes of charismatic/transformational leadership universally endorsed? *Leadership Quarterly*, 10(2), 219–256.
- Fiedler, F. E. (1996). Research on leadership selection and training: One view of the future. *Administrative Science Quarterly*, 41, 241–250.
- Forbes, D., & Millikin, F. (1999). Cognition and corporate governance: Understanding boards of directors as strategic decision-making groups. *Academy of Management Review*, 24(3), 489–505.
- French, R. (2001). "Negative capability": Managing the confusing uncertainties of change. *Journal of Organizational Change Management*, 14(5), 480–492.
- Greenleaf, R. K. (2002). Servant leadership: A journey into the nature of legitimate power and greatness (25th ed.). Mahwah, NJ: Paulist Press.
- Hersey, P., & Blanchard, K. (1982). Management of organizational behavior: Utilizing human resources. Englewood Cliffs, NJ: Prentice-Hall.
- Hofstede, G. (2001). *Culture's consequences: Comparing values, behaviors, institutions, and organizations across nations* (2nd ed.). London: Sage.
- House, R. J., Hanges, P. J., Javidan, M., Dorfman, P. W., & Gupta, V. (Eds.). (2004). Culture, leadership, and organizations: The GLOBE study of 62 cultures. Thousand Oaks, CA: Sage.
- House, R. J., & Aditya, R. M. (1997). The social scientific study of leadership: Quo vadis? *Journal of Management*, 23(3), 409–464.
- Kotter, J. P. (2007). Leading change. *Harvard Business Review*, 85(1), 96–103.
- Kouzes, J. M., & Posner, B. Z. (2002) *The leadership challenge* (3rd ed.). San Francisco: Jossey-Bass.
- Meindl, J. R. (1990). On leadership: An alternative to the conventional wisdom. In B. M. Staw & L. L. Cummings (Eds.), *Research in organizational behavior* (Vol. 12, pp. 159–203).
- Northouse, P. G. (2004). *Leadership: Theory and practice*. Thousand Oaks: Sage.
- Starbuck, W. (2005). Four great conflicts of the twenty-first century. In C. L. Cooper (Ed.), *Leadership and management in the twenty-first century: Business challenges of the future* (pp. 21–56). Oxford, UK: Oxford University Press.
- Vaill, P. (1989). *Managing as a performing art*. San Francisco: Jossey Bass.
- Yukl, G. (1998). *Leadership in organizations* (4th ed.). Englewood Cliffs, NJ: Prentice-Hall.

REMOTE LEADERSHIP

ELIZABETH KELLEY

Dalhousie University

E. KEVIN KELLOWAY

St. Mary's University

ncreasingly, organizations are making use of information technology to enable employees to work at a distance from their managers, their work groups, and/or their offices. Implementation comes in a variety of configurations-virtual teams, flextime, telecommuting, and other remote working arrangements—and, despite the great hopes for improved employee satisfaction and productivity, many of these arrangements are not considered to be successful by either the manager and/or the employee. One explanation for the mixed results may be the fact that little is known about how remote working relationships affect human dynamics. To date, there has been minimal investigation into the nature of working in an environment in which the leader and follower are separated by physical distance and the majority of one's interaction with a manager and/or coworkers is conducted through technology. Much of the existing knowledge about remote leadership comes from anecdotal sources or from research done with virtual teams. Little is known about the effect of the remote context on the relationship between a leader and the individual follower. With the number of organizations using remote working arrangements estimated to be in the range of 50% and increasing every year, most individuals will eventually be required either to manage or to be managed in some variation of a remote environment. It is important that they understand the complexities that influence their effectiveness in this context. This chapter explains the range of factors unique to the remote environment, discusses the challenges these factors present and notes the significant gaps in understanding this phenomenon. It discusses the importance of trust and of how behaviors inherent in transformational leadership style build trust, increasing the effectiveness of leadership, even at a distance. The chapter concludes with some suggestions based on both scholarly and practitioner thought on how to effectively implement some of the transformational leadership behaviors in a remote relationship, as well as a list of suggestions for further reading.

DEFINITIONAL ISSUES

Traditional working arrangements in which the leader and his or her direct reports are located physically in the same place are called "proximal." Working arrangements in which the leader and his or her direct reports are separated by distance are referred to using several different labels; for example, remote leadership, virtual leadership, and eleadership have all been used in practitioner and scholarly writing. While they all mean approximately the same thing, there are slight nuances and ambiguities that require clarification when conducting research in this area. For example, virtual leadership could include the concept of emergent leadership and/or leadership substitutes, as well as leadership via electronic means. E-leadership has been defined as referring to situations in which the leader-member relationship as well as the collection and dissemination of

information required to support organizational work takes place via information technology. In this chapter, the term remote leadership is used to connote leader-member relationships in which members are at a physical distance from their leaders; specifically not collocated in the same building, causing face-to-face interaction to be reduced. In this definition, the form of interaction with the leader, generally dictated by the physical collocation arrangement, defines the condition. There are varying degrees of remote leadership, depending on the amount of face-to-face contact that occurs. Some workers have never met their leader face-to-face, while others may see their leader occasionally such as once per week or less. Despite this continuum, in this chapter, remote leadership will be used to refer to all relationships in which the majority of interaction between the member and the leader is conducted by means of technology rather than face-to-face.

THEORY

The theoretical development of a model of leadership in which the leader and the follower do not interact on a face-to-face basis is in its preliminary stages (Schiller & Mandviwalla, 2007). The existing research and theory in the field of organizational behavior is based on a proximal model in which individuals interact with their leaders and group members on a face-to-face basis and aspects of this traditional context have been researched extensively. Studies have consistently demonstrated the importance of leadership to group and individual outcomes in a proximal arrangement. However, there is little empirical data to suggest that the findings of research conducted in a proximal leadership situation are applicable to the remote model. To date, there is not even a consensus that the two environments are different enough to require differing models of leadership. By examining applicable pieces of disparate theories, this chapter attempts to integrate what is known about the remote context with a theory of effective leadership based on a proximal model.

THE REMOTE CONTEXT

It has been observed that it is impossible to understand behavior in organizations without an explicit consideration of the organizational context and this has been largely overlooked in organizational behavior research (Porter & McLaughlin, 2006). Indeed, three major models of leadership—path-goal theory, contingency theory of leadership, and the leadership substitutes model—give consideration to context, either as a moderating influence as in path goal or as a pivotal factor as in contingency theory. However, the effect of contextual factors specifically on the leadermember relationship has gone relatively unexplored in both the proximal and remote settings. Previous generations of experience in proximal settings contribute to the percep-

tion of this context as natural and familiar, and hence, it is generally unexamined. Remote work settings, however, are unfamiliar, unnatural environments in which to develop and conduct a relationship. The remote work environment has been characterized as one of isolation, exclusion, increased flexibility, and perceptions of autonomy. Despite the fact that, for the most part, differences between the remote and proximal contexts have been neither inventoried nor explored empirically, consideration of the remote environment suggests several factors that might define the context within which remote leader-member relationships are conducted and which may influence leader and member behaviors.

Distance

Remote working arrangements are generally characterized by physical distance between the individual and/or group members or leaders. Physical proximity is important to relationships; for example, it has been shown to enhance attraction through increased accessibility and familiarity (Moon, 1999). Also, proximity increases the likelihood of future interaction, which makes people more responsive to individuals who are nearer geographically (Latane, Liu, Nowak, Bonavento, & Zheng, 1995).

Most scholarly work involving distance has focused specifically on its impact on leadership effectiveness, although much of the writing is based on conjecture rather than research. Several authors have argued that physical distance between a leader and member has negative effects on both the relationship and the outcomes, in terms of member performance and satisfaction (Napier & Ferris, 1993). Other researchers have gone so far as to observe that distance renders leadership impossible (Howell & Hall-Merenda, 1999). In addition to these generalized opinions, some specific effects of remote working arrangements have been identified. For example, when members can interact with the leader in person, they can assess the leader's actions and performance directly, rather than relying on potentially flawed attributions (Antonakis & Atwater, 2002). As well, members more strongly identify with a leader they can see (Kayworth & Leidner, 2002). Identification with a leader increases the degree of influence the leader can exert. Finally, physical distance may make it difficult for a leader to monitor and rate follower performance, forcing them to rely on single indicators (e.g., objective results) or erroneous cues, without the benefit of context.

Reduced Face-to-Face Interaction

Generally, reduced face-to-face interaction is the result when the leader and the member are physically distant. When face-to-face interaction is minimal, most communication is conducted using some form of media. Throughout human history, significant personal relationships have been based on some amount of face-to-face interaction. It is yet unknown whether relationships without this face-to-face component can be effective or how they can be developed

and sustained. Findings on the effect of this substitution of technologically mediated communication for face-to-face communication have been mixed. Preliminary studies with groups suggest that some measure of face-to-face contact is associated with superior virtual team performance, but there is no consensus on when or for what duration that face-to-face contact is required. Is it better for groups to meet in person at their formation or later at critical points in their tasks? There is no conclusive evidence to answer this question. The leader-member relationship is different from relationships among group members in ways that affect the relationship itself. For example, in a leader-member relationship, power is usually unequal. This can add to inaccurate interpretations of communication on both parts; inaccurate interpretations, as explained later, are more apt to result in situations devoid of nonverbal cues. Therefore, it may be that face-to-face contact is even more important in a remote leader-member relationship than it is in virtual team relationships.

Communication Quality

In technologically mediated communication, the quality of the communication is different than in face-to-face communication. Some studies suggest that the medium used to communicate does not impact communication quality. Specifically, according to Walther's (1996) social information processing theory, computer-mediated communication transmits as much social information as face-to-face communication, the only difference being a slower rate of transfer. In fact, Walther found that social discussion, depth, and intimacy were greater in virtual groups than in face-to-face groups, even for groups with geographically dispersed and culturally diverse partners who had never met face-to-face. However, these results should be interpreted cautiously, since individuals have a tendency to resort to overattributions on minimal social cues in virtual groups, and as well, this research dealt with groups rather than the specific remote leadership relationship.

There is a consensus, despite Walther's (1996) findings, that e-mail and computer conferencing are often perceived as less "warm" than face-to-face communication, and some research suggests that e-mail messages contain higher levels of negativity than other forms of communication do (Berry, 2006; Kurtzberg, Naquin, & Belkin, 2005). This is important because better communication correlates with higher levels of trust and increased team performance (Jarvenpaa, Knoll, & Leidner, 1998; Jarvenpaa & Leidner, 1998; Ross, 2006). One obvious drawback to technologically mediated communication is the loss of nonverbal cues that are available in face-to-face communication. It has been estimated that these cues convey as much as two thirds of the content of a message. For example, the telephone is capable of transmitting only about 37% of the sound frequency emitted by the human voice, making it difficult to detect nuances and differentiate among emotions (Workman, Kahnweiler, & Bommer, 2003). This loss of information can impact both leader and member performance and satisfaction, through, for example, misinterpretation of facts, greater role ambiguity, lack of trust, cue substitution, inaccurate perceptions of self and others, lowered leader influence, and underdeveloped group cohesiveness. Studies suggest that this decrease in nonverbal cues may have various other negative effects: for example, teams in a remote environment may take longer to make decisions (Hollingshead, McGrath, & O'Connor, 1993) and there may be reduced levels of interpersonal relations between individuals (Weisband & Atwater, 1999). Furthermore, nonverbal cues act as devices to regulate interaction. Gestures such as head nods, quizzical looks, and eye contact provide direction to the course of the communication, as well as feedback as to whether the message was understood, or requires further explanation or repetition, reducing ambiguity and error (Straus & McGrath, 1994). In the absence of nonverbal cues, conversational flow may become difficult and communication clarity may be negatively affected. Finally, it is more difficult for leaders to be charismatic when there are no nonverbal cues on which to rely; charisma is not solely a function of textual content but rather is projected through voice, body language, and other nonverbal cues.

In remote communication, social context cues are also absent. Social context reflects how the people around some one relate to that person and how they interpret that person's actions or words. Social context influences how a person is viewed. In face-to-face communication, social context cues provide information about leader legitimacy, expertise, and status. For example, if everyone grows silent immediately when a leader speaks, this conveys a very different message than if everyone keeps talking. An absence of social context has been found to lead to the use of more negative tone, more assertive and hostile language, and an increased sense of depersonalization, which hinders the development of relationships and, ultimately, trust (Kayworth & Leidner, 2002). As well, leader influence may be reduced because it is more difficult for a leader to convey expert or referent power in the absence of these social context cues.

In contrast, there is some preliminary evidence that loss of nonverbal and social context cues may be beneficial in certain ways. Virtual communication may eliminate bias toward others because individuals tend to be substantially influenced by source cues unrelated to content, such as physical attractiveness, age, ethnicity, or speaking style. In the remote environment, these elements are not accessible. Further, without nonverbal information to process, there is less chance of cognitive overload, and it is easier to evaluate others' contributions accurately (Weisband & Atwater, 1999). Again, these findings refer to members of virtual groups rather than the participants in a specific leader-member relationship.

Communication Quantity

Another potential consequence of reduced face-to-face contact is the reduction in the amount of communication

between a member and a leader and among group members (Straus, 1997). Communication frequency itself is important in a remote environment; merely communicating more improves working relationships and job satisfaction among team members (Hart & McLeod, 2002). It has been suggested that a higher frequency of communication by the leader in the remote environment may increase members' perceptions of trust (Staples, 2001). The decrease in communication frequency that characterizes many remote relationships may be partially accounted for by the difficulty in engaging in serendipitous communication when face-toface interaction is limited. Serendipitous communications refers to chance encounters that provide an opportunity for casual information sharing of both a task-related and a social nature. In a remote environment, chance encounters do not occur and many members would understandably be reluctant to e-mail or telephone their leaders for a lengthy "around the watercooler" chat. In the remote environment, most of the contact is task related, with little social content. This is unfortunate because social communication is important in all relationships and is particularly difficult to enact spontaneously in remote working arrangements. Previous research suggests that virtual teams in which members send more social communication achieve higher trust and better social and emotional relationships (Jarvenpaa & Leidner, 1998). Length of social interaction is also important and in the remote environment, length may be constrained by the technology itself. For example, there is evidence suggesting that when social interaction does occur using computermediated technology, it is often limited in length due to the physical effort involved with typing what are perceived as nonessential words (Straus, 1997).

Media Selection and Use

Media has been characterized as existing along a continuum of "richness" which refers to its capacity for rapid feedback, language variety, personalization, and multiple cues (Daft & Lengel, 1984). The continuum ranges from email to face-to-face meetings, with e-mail being the lowest in social presence and face-to-face meetings being the highest. In previous studies, social presence has been correlated with variation in task orientation, depersonalization, communicative tone, and participation of members of virtual groups (Daft & Lengel, 1984).

Effectiveness of electronic communication may depend on an appropriate match between media richness and message content. For example, when tasks are routine and content is straightforward, lean media that convey fewer nonverbal cues and more sparse feedback may be appropriate. Richer media are considered more appropriate for conveying complex or sensitive information. However, this is not as straightforward as it would seem. Perception of media richness is significantly influenced by contextual factors such as nature of the task or group and cultural norms as well as by individual characteristics such as expertise in the technology (Fulk, 1993). For example, job pres-

sures may lead an individual to choose media with rapid communication capability such as telephone and e-mail. Although a lean medium is most efficient for a routine task, individuals may choose to use rich media for lean tasks, if that is a norm of communication within their work group. Clearly, attaining the appropriate match between technology and message does not entail the application of universal guidelines. Thus, not only do leaders in a remote relationship with their followers need a knowledge of communication technology; they require skill in determining the appropriate medium by which to send various types of information to different members, as well as in crafting the message appropriately.

Task

A large body of research, dating from the mid-20th century examines various elements of the relationship between task and leadership. In traditional work situations, the degree of task complexity, routineness, and interdependence suggests various approaches to managing followers, depending on moderating factors such as member characteristics and organizational culture. In the remote environment, however, these variables have been only minimally considered, and largely within the context of choice of media.

Task type has been consistently found to moderate the effects of remoteness on team outcomes (Daly, 1993). Prior studies suggest that task type is critical to the success and speed with which virtual groups make decisions and the level of intragroup conflict (Kankanhalli, Tan, & Wei, 2007; Straus & McGrath, 1994). For instance, with an ambiguous task, the greater the degree of technologically mediated communication used by a group, the longer the group took to reach a shared goal. For negotiation and intellective tasks, initially face-to-face teams performed significantly better, but this difference decreased over time, suggesting the existence of a learning curve effect. For decision-making tasks, there were no differences found. Other studies suggest that idea generation tasks are performed by computer-mediated groups more effectively than by face-to-face groups (Martins, Gilson, & Maynard, 2004). Finally, evidence exists that computermediated communication is particularly inappropriate for groups facing highly interdependent tasks requiring significant levels of coordination and judgment (Hedlund, Ilgen, & Hollenbeck, 1998). Beyond these relationships between task type and choice of communication media, there is little known about the influence of task type in the remote environment.

Collocation

A related contextual feature of the remote work arrangement is the extent to which individuals are collocated with other organizational members. It is increasingly common for organizational members to belong to more than one work group, only some of whom interact primarily through technologically mediated methods. By definition,

if a leader-member relationship is remote, the leader and member are not collocated. However, a number of other combinations is possible. Members might work entirely alone; they might be collocated with other members of their own group; they might be physically situated with members of other groups, while interacting with their own group through technology; or finally, the leader might be collocated with some members of the group and not with others.

The influence of collocated group members on individual outcomes has been firmly established in previous research. To date, there has been little exploration of the effect on the leader-member relationship when only the leader is distant and the team members are all collocated. Preliminary research on mixed collocation models suggests that organizational members, who are not part of the member's work group but are collocated with the member, have an impact on that member's attitudes and behaviors (Fulk, 1993). Finally, the situation in which the member is distant while other members of his or her group are collocated with the leader has not specifically been explored in empirical studies. This frequently occurs with the majority of a group being located at "head office," while one or more members are located at a distance. Some consequences of this type of mixed collocation arrangement can be inferred. In teams in which only some members are collocated, the distant member often assumes that collocated members are sharing something they have missed, and these private exchanges can be the cause of friction. Moreover, members may perceive a greater need to use upward influence tactics and engage in impression management when they are distant from their leaders, while at the same time experiencing reduced opportunities to do so. Some research suggests that these are valid concerns; for example, employees' performance ratings tend to increase with the number of opportunities a supervisor had to observe them (Judge & Ferris, 1993). This type of effect may lead to increased political behavior in the work place with its attendant consequences, and a sense of being isolated and excluded among those who are distant, all of which has implications for leading in this environment.

Individual Characteristics

The importance of fit between the person and the job in the proximal environment has been widely demonstrated in previous research (Hoffman & Woehr, 2006). It is only logical to conclude that there may be an issue of fit with the remote environment; some individuals may not be suited to work as either a member or a leader in this setting. As well, recent research suggests that different individuals respond to the same situation and leadership style in different ways (Hautala, 2006). Therefore, it may be that individual characteristics influence the remote leader-member relationship differently than they do in a proximal environment. Such self-management qualities as responsibility, dependability, independence, and self-sufficiency, while desirable in face-

to-face settings, might reasonably be crucial to the viability of remote work. In order to effectively match the message with the medium, as discussed earlier, and craft the message appropriately, some measure of cultural sensitivity and awareness could be considered requisite qualities for both leaders and followers in a remote environment.

There have been some preliminary investigations into the effect of personality dimensions of both leaders and followers on effectiveness in a remote situation. Openness to experience and extroversion, in particular, may impact an individual's suitability for work in a computer-mediated setting; for example, higher levels of extroversion have been positively related to higher levels of participation in computer-mediated groups in some studies, but not in others. A worker's belief in his or her ability to be successful in remote work, a concept called "remote working self-efficacy" (Staples, Hulland, & Higgins, 1999) has been suggested as critical for both roles.

There are aspects of individual suitability that are more pragmatic for remote leader-member relationships as well. For example, a minimum level of technological competence is clearly vital for both leaders and followers in an environment in which technology forms the platform for communication; this implies that both a willingness and an ability to use existing and emerging communication technology is required. In summary, little is known about how individual characteristics influence effectiveness in a remote leadership situation, but self-management attributes and a perception of self-efficacy may be beneficial for followers in the remote environment, where there is reduced communication between a leader and follower.

There is a huge body of research into leader characteristics and competencies in the proximal environment, but specific leader characteristics that may be required in a remote environment have not been investigated. Since most of the communication in a remote relationship is conducted through text, it could be that leaders who are articulate in a text mode would be more successful than would those whose strength is oral presentation. Similarly, given the requirement to be sensitive to wording and media selection for various messages, it may be that different (or additional) aptitudes are required in an effective remote leader. In the absence of research into this question, it appears that the practice has been to assume that remote leadership does not require different characteristics or behaviors than proximal leadership.

LEADERSHIP

There is no widely accepted prescription for how to lead effectively in a remote environment. Obviously, organizations ignore the findings that suggest remote leadership cannot be effective and continue to implement remote working arrangements, some of which are successful. At the time of writing, most of the explanations for these successes are purely anecdotal. Research has yet to conclusively

demonstrate whether leading effectively in a remote environment requires different behaviors than leading proximally, let alone what those behaviors might be. It is possible that practitioners in this situation continue to manage as they always have, without specific consideration of the unique contextual elements that comprise the remote environment. Significant, however, is the finding that individuals do not need to be face-to-face with a leader to discern and to be influenced by leader behaviors. Followers can actually perceive differences in leadership styles in computer-mediated communication (Kelloway, Barling, Kelley, Comtois, & Gatien, 2003).

Transformational Leadership Style

A large body of research on leadership in the proximal environment suggests that one set of leadership behaviors may be more effective than others are. This style is called "transformational leadership." Arguably the most researched style of leadership, transformational leadership, as conceptualized by Bass (1985), enables followers to transcend their own self-interests for a higher collective vision and, thereby, exceed performance expectations. It has repeatedly been found to have differential effects on followers' performance, both directly and indirectly (Boerner, Eisenbeiss, & Griesser, 2007). Transformational leader behaviors cluster into four factors: (a) idealized influence, (b) inspirational motivation, (c) individualized consideration, and (d) intellectual stimulation. Idealized influence (sometimes called "charisma") simply put is doing the right thing because it is the right thing to do. Idealized influence behaviors are those that build trust and respect from subordinates. A leader demonstrating these behaviors is a role model—subordinates want to be like the leader and desire to achieve high levels of performance in order to support the leader. Inspirational motivation is composed of leadership behaviors that motivate individuals to try harder and exert extra effort to achieve desired goals. A leader demonstrating inspirational motivation clarifies objectives and elevates expectations. Individualized consideration is comprised of leadership behaviors that show concern and caring for others. A leader demonstrating individualized consideration is alert to the needs of others, provides learning opportunities, and helps to develop individuals. It requires treating followers differently but equitably on a one-on-one basis. Intellectual stimulation requires followers to look at old problems in new ways. It consists of leadership behaviors that encourage individuals to imagine different ways of doing things and to question existing practices. A leader demonstrating intellectual stimulation questions the status quo, uses reason, and generates alternative solutions.

Despite the extensive body of research into this style of leadership, the question of how organizational context influences its effectiveness is still relatively unexplored. This is particularly true when the context in which the transformational leadership behaviors are enacted is primarily

situated in technology. The setting may negate or enhance the impact of various transformational leader behaviors. Behaviors not traditionally part of the transformational leadership model may assume greater significance in the virtual environment. Other contextual factors, such as task interdependence, amount of face-to-face contact, and follower characteristics may moderate the impact of these leader behaviors.

The few existing studies on transformational leadership at a distance have yielded conflicting findings about its overall effectiveness in this environment. Some studies have found that transformational leadership behaviors are just as effective in managing individuals in the remote environment as in the proximal one, while others have not (Howell, Neufeld, & Avolio, 2005). The intellectual stimulation component of transformational leadership behaviors in particular has been found to translate easily into the remote environment. This component consists of behaviors that encourage questioning of assumptions and a reframing of traditional thinking. Remote leaders can easily utilize communication technology to provide intellectual stimulation by increasing the level and nature of information exchange (Kelloway et al., 2003).

However, the other components of transformational leadership behavior may not be so easy to enact in the remote environment. Distance between the leader and the member may reduce the effectiveness of some of the behaviors that comprise the inspirational motivation and individualized consideration components. When leaders are proximal, they may be more easily able to tailor communications to the individual in a way that increases that follower's confidence in his or her ability to achieve higher levels of performance. The supportive behavior, defined as members feeling that their leader values their contribution and cares about their well-being (Lynch, Eisenberger, & Armeli, 1999), that characterizes individualized consideration may also be difficult to enact remotely. This form of support has long been recognized as an important predictor of individual job satisfaction, turnover intentions, and performance. In a proximal setting, leaders can engage in face-to-face interaction and social visiting to display social support, but this is unlikely to occur frequently in a remote environment and may negatively affect the enactment of individualized consideration.

Trust

Transformational leadership style is highly correlated with perceived trust in the leader (Dirks & Ferrin, 2002). Trust is built by transformational leadership behaviors, and it provides the necessary condition for this style of leadership to be effective. Researchers have recognized the significance of trust in leadership in face-to-face environments for at least 4 decades. Trust influences the impact that leadership style has on followers' satisfaction, work attitudes, organizational citizenship behaviors, and job

performance (Bartram & Casimir, 2007). Trust has been defined in various ways, but most definitions include the concept of vulnerability: Trust allows people to take part in risky activities that they cannot control or monitor and yet where they may be disappointed by the actions of others (Jarvenpaa et al., 1998). Specific attitudes involved in the formation of trust in leader are perceptions of leader's ability (group of skills enabling individual to be trusted to be competent), benevolence (positive orientation of leader to follower—interpersonal care, support, and concern), and integrity (leader's adherence to set of principles that follower finds acceptable). Almost all definitions of trust fall into one of two categories-trust as relationship based or trust as character based. Both conceptualizations are consistent with the processes inherent in transformational leadership style.

Specifically, transformational leaders enact various behaviors that build trust. For example, when engaging in intellectual stimulation, leaders encourage their followers to rethink problems and take risks to solve them. This permission for followers to take risks encourages the formation of trust by creating a condition of safety from the consequences of potential failure; the follower, in a vulnerable position, is not disappointed by the leader's reaction to his or her risk taking. Transformational leader behaviors that enact individualized consideration develop and maintain a social bond. When the leader-follower relationship is characterized by a social bond, trust is more likely to result than when the relationship is purely transactional. A significant component of transformational leadership is "walking the talk" or modeling the vision. This alignment between espoused and enacted values builds leader credibility, also resulting in increased trust. Finally, by emphasizing the collective vision and encouraging identification with other group members, the transformational leader may increase the individual follower's perception of procedural justice, leading to increased trust in the leader (Pillai, Schriesheim, & Williams, 1999).

However conceptualized, it appears that the dimensions of trust may not arise in the same manner in the case of a leader who does not frequently interact on a face-to-face basis with members; yet, in remote environments, trust may be even more critical to leadership effectiveness. Some preliminary research has demonstrated that trust in leader significantly impacts perceptions of performance, job satisfaction, and job stress for remote workers, just as it does for proximal workers (Staples, 2001).

Distance may create significant obstacles to the development of trust. For example, a leader's competence and integrity are evident to followers who are physically close to the leader and can directly observe that leader's performance and behavior. If followers do not have regular face-to-face contact with the leader, however, they do not have access to this information. Therefore, the ways in which a leader is legitimized and trusted are different in a remote relationship. As well, there is generally a reduced level and duration of

communication in a remote leader-member relationship and this may impede the development of the social bond that is critical to the formation of relationship-based trust. The level of media richness associated with the communication platform used may both negatively and positively affect the development of trust in remote relationships. Specifically, how a leader delivers his or her vision may have a greater impact on follower perceptions than does the actual content of the message and other organizational performance cues. Thus, communicating at a distance, in the absence of these nonverbal cues, may make it especially difficult for leaders to be inspirational. Conversely, a weak delivery can act as "noise," which undermines the impact of an inspirational message, so distance in some instances may be beneficial to the trust-building process.

Recipients' perceptions of the sender's ability, benevolence, and integrity contribute significantly to the development of trust in that sender. These perceptions are influenced by several factors specific to communication in the remote environment such as the capacity for immediate feedback, the number of cues and channels used for information, the level of personalization, and the language used. Whether these factors enhance or detract from perceptions of ability, benevolence, and integrity can depend on various conditions such as the communication platform used, which dictates the immediacy of feedback as well as the number of channels and cues available; the skill of the sender at wording messages appropriately, which determines the effectiveness of the language used; and preexisting relationships with the sender, which influence the recipient's expectations about the level of personalization (Wilson, Straus, & McEvily, 2006). As well, personal, organizational, or cultural norms for electronic communication can create erroneous negative attributions, impeding the development of trust. For example, an e-mail message with no salutation may be perceived by the recipient to be rude or unfriendly, depending on his or her expectations, when this was not the sender's intention (Black, 2006). In the presence of previously established trust, however, this type of communication may not be perceived negatively (Kelley, 2005). Each of these factors adds a layer of complication to the development of trust in the remote relationship.

In transformational leadership, building and employing trust is an iterative process. For example, trust is required if transformational leaders are to mobilize follower commitment toward their vision. Once that vision has been articulated and enacted, however, trust in leader increases, as followers perceive an alignment between words and deeds. Intellectual stimulation behaviors, in addition to building trust, employ it as well. In the absence of trust, followers will be unlikely to be willing to take risks to support transformational leaders' attempts to change the status quo.

Trust is pivotal in most human relationships; it has many times been called the "social glue" that makes relationships work. This is especially true between a leader and a follower, a relationship that is often perceived as adversarial. The greater the uncertainty is in a situation, the greater the need is for trust (Dirks & Ferrin, 2002). In the remote environment, with the increased level of uncertainty caused by the very context of that environment (loss of nonverbal cues, reduced frequency of communication, etc.), trust is critical. Transformational leadership, a style that is rooted in building and employing trust, may thus be the most effective way to lead in the remote environment.

SUGGESTIONS FOR EFFECTIVE REMOTE LEADERSHIP

Researchers have been investigating leadership for more than 80 years and there are still significant questions that have not been answered. Remote leadership is a relatively recent phenomenon and therefore there are few answers and many questions. What advice can be given to individuals tasked with leading remotely? Preliminary research, theoretically based arguments, and common sense can all be leveraged to provide direction in the absence of solid empirical findings. Leading is a sophisticated and sometimes difficult task; leading at a distance appears to be even more so because of the extra complexity introduced by the remote context. This is both a good news/bad news situation. The "good" news is that preliminary research has demonstrated that it is possible to establish perceptions of transformational leadership from a distance and that, once established, positive outcomes result. The "bad" news is that theory and common sense, as well as some research, suggest that establishing this perception takes significant effort. In remote leadership, the mantra should be "communicate, communicate, communicate."

The goal of a remote leader's communication efforts should be to replicate that serendipitous two-way contact that so easily occurs with collocated followers. To achieve the beneficial effects of transformational leadership style, it is necessary that leaders build rapport, trust, perceptions of support, and a social bond with their followers. To accomplish this in the remote environment, leaders must communicate with followers on a frequent basis (Powell, Galvin, & Piccoli, 2006). Leaders should avoid the pitfall of having more frequent communication only with those with whom it is easy to communicate—the proximal followers. Proximal followers naturally have more opportunities for interaction but managers must manufacture similar opportunities for remote followers. A regularly scheduled time for communication such as a given time slot every 2 weeks, for example, may facilitate achieving an optimal frequency of interaction. This has an added trust-building benefit—as managers adhere to the schedule, followers will perceive them to be reliable and consistent.

In addition to frequency of communication, remote leaders must consider the choice of media and content of messages. Organizational and national culture, group norms, individual characteristics and aptitudes, at a minimum, must be factored into this process. Communication with follow-

ers should not be solely focused on task. In order to enact both the individualized consideration and inspirational motivation components of transformational leadership, leaders must engage in social interaction with their followers. A leader cannot demonstrate customized care for the follower as an individual and his or her development if all of their interaction is work related. Similarly, in order to build the confidence of remote followers and assist them in achieving higher levels of performance, the leader must understand the individual follower's unique characteristics, concerns, and abilities. To achieve this understanding requires communication of a social nature. The remote leader-follower relationship should be characterized by open, honest communication in which individuals feel free to initiate casual interaction through various media. If followers feel that they will be negatively viewed because they initiate contact in the absence of a serious problem, they will perceive a lack of control and trust in both directions; there will be motivational consequences. Creating a reciprocal perception of trust mitigates remote followers' feelings of isolation and powerlessness.

To enact both intellectual stimulation and idealized influence, leaders must share information with their remote followers. Remote followers are often in danger of being left out of the information loop. This has several negative consequences: They are unable to contribute fully, they feel marginalized, and they perceive a lack of control. These outcomes can damage the trust relationship and render transformational leader behaviors ineffective. Explaining corporate drivers, the rationale behind decisions, and current organizational issues enables remote leaders to more convincingly present a vision of the future, role model ethical and transparent decision-making processes, and seek constructive input from the followers.

An important step in the establishment of trust is a faceto-face meeting occasionally, particularly at the beginning of a leader-follower relationship. In fact, in selection, a preexisting relationship might be one of the attributes that leaders factor into their favorable evaluation of a candidate.

Do Nots

A list of "do nots" for both leaders and members could include the following points:

- 1. Do not assume that your e-mail messages, in fact, have been clear or even received; the onus is on the sender to ensure that the message has been received and understood. This is accomplished in face-to-face interaction through nonverbal signals, but in a remote relationship, active seeking of feedback is required. As individuals become more comfortable with cyberspace, they tend to become more complacent, relying naively on the infallibility of technology.
- As a follower, do not assume that you cannot influence the communication protocols with your leader. Take responsibility for asking for more frequent or different communication, if that is what is required.

- 3. As a leader, do not assume that the same level or type of communication will suit every member and do not interpret silence as acquiescence or comprehension.
- 4. As a leader or a member, do not assume that a remote relationship requires the same behavior as a proximal leader-member relationship; it appears to be an essentially different arrangement and both parties must factor this into their behavior and expectations.
- As either a leader or a member, do not be discouraged with remote relationships; with effort and experience on the part of both participants, these relationships can have positive outcomes.

REFERENCES AND FURTHER READINGS

- Antonakis, J., & Atwater, L. (2002). Leader distance: A review and a proposed theory. The Leadership Quarterly, 13(6), 673–704.
- Avolio, B. J., Kahai, S., & Dodge, G. E. (2000). E-leadership: Implications for theory, research and practice. *Leadership Quarterly*, 11(4), 615–668.
- Bailey, D. E., & Kurland, N. B. (2002). A review of telework research: Findings, new directions, and lessons for the study of modern work. *Journal of Organizational Behavior*, 23, 383–400.
- Bartram, T., & Casimir, G. (2007). The relationship between leadership and follower in-role performance and satisfaction with the leader: The mediating effects of empowerment and trust in the leader. *Leadership & Organization Development Journal*, 28(1), 4–19.
- Bass, B. M. (1985). Leadership and performance beyond expectations. New York: Free Press.
- Bass, B. M., & Avolio, B. J. (1994). Improving organizational effectiveness through transformational leadership. Thousand Oaks, CA: Sage.
- Berry, G. R. (2006). Can computer-mediated asynchronous communication improve team processes and decision making? Learning from the management literature. *Journal of Business Communication*, 43(4), 344–366.
- Black, L. (2006). The Influence of workload and incivility level on the perception and perpetration of e-mail incivility. Unpublished master's thesis, Saint Mary's University, Halifax, Nova Scotia, Canada.
- Boerner, S., Eisenbeiss, S. A., & Griesser, D. (2007). Follower behavior and organizational performance: the impact of transformational leaders. *Journal of Leadership & Organizational Studies*, *13*(3), 15–27.
- Daft, R. L., & Lengel, R. H. (1984). Information richness: a new approach to managerial behavior and organization design. In
 B. M. Staw & L. L. Cummings (Eds.), *Research in organizational behaviour* (Vol. 6, pp. 191–233). Greenwich, CT: JAI Press.
- Daly, B. L. (1993). The influence of face-to-face versus computermediated communication channels on collective deduction. *Accounting, Management and Information Technologies, 3,* 1–22.
- Dirks, K. T., & Ferrin, D. L. (2002). Trust in leadership: Metaanalytic findings and implications for research and practice. *Journal of Applied Psychology*, 87(4), 611–628.

- Fulk, J. (1993). Social construction of communication technology. *Academy of Management Journal*, *36*(5), 921–950.
- Hart, R. K., & McLeod, P. L. (2002). Rethinking team building in geographically dispersed teams: one message at a time. *Organizational Dynamics*, 31(4), 352–361.
- Hautala, T. M. (2006). The relationship between personality and transformational leadership. *Journal of Management Development*, 25(8), 777–794.
- Hedlund, J., Ilgen, D. R., & Hollenbeck, J. R. (1998). Decision accuracy in computer-mediated versus face-to-face decision-making teams. *Organizational Behavior and Human Decision Processes*, 76(1), 30–47.
- Hoffman, B. J., & Woehr, D. J. (2006). A quantitative review of the relationship between person-organization fit and behavioral outcomes. *Journal of Vocational Behavior*, 68(3), 389–399.
- Hollingshead, A., McGrath, J., & O'Connor, K. (1993). Group task performance and communication technology: a longitudinal study of computer-mediated versus face-to-face groups. *Small Group Research*, 24(3), 307–333.
- Howell, J. M., & Hall-Merenda, K. E. (1999). The ties that bind the impact of leader—member exchange, transformational and transactional leadership, and distance on predicting follower performance. *Journal of Applied Psychology*, 84(5), 680–694.
- Howell, J. M., Neufeld, D. J., & Avolio, B. J. (2005). Examining the relationship of leadership and physical distance with business unit performance. *The Leadership Quarterly*, 16(2), 273–285.
- Jarvenpaa, S. L., Knoll, K., & Leidner, D. E. (1998). Is anybody out there? Antecedents of trust in global virtual teams. *Jour*nal of Management Information Systems, 14(2), 29–62.
- Jarvenpaa, S. L., & Leidner, D. E. (1998). Communication and trust in global virtual teams. *Journal of Computer Mediated Communication*, 3(4), 1–40.
- Judge, T., & Ferris, G. R. (1993). Social context of performance evaluation decisions. Academy of Management Journal, 36, 80–105.
- Kankanhalli, A., Tan, B. C. Y., & Wei, K. (2007). Conflict and performance in global virtual teams. *Journal of Management Information Systems*, 23(3), 237–274.
- Kayworth, T. R., & Leidner, D. E. (2002). Leadership effectiveness in global virtual teams. *Journal of Management Infor*mation Systems, 18(3), 7–40.
- Kelley, E. (2005). Context and leadership in the remote environment. Unpublished doctoral dissertation, Saint Mary's University, Halifax, Nova Scotia, Canada.
- Kelloway, E. K., Barling, J., Kelley, E., Comtois, J., & Gatien, B. (2003). Remote transformational leadership. *Leadership & Organization Development Journal*, 24(3), 163–171.
- Kurtzberg, T. R., Naquin, C. E., & Belkin, L. Y. (2005). Electronic performance appraisals: The effects of e-mail communication on peer ratings in actual and simulated environments. *Organizational Behavior and Human Decision Processes*, 98(2), 216–226.
- Latane, B., Liu, J., Nowak., A., Bonavento, M., & Zheng, L. (1995). Distance matters: Physical distance and social impact. Personality and Social Psychology Bulletin, 21, 795–805.
- Lynch, P. D., Eisenberger, R., & Armeli, S. (1999). Perceived organizational support: Inferior versus superior performance by wary employees. *Journal of Applied Psychology*, 84(4), 467–483.

- Martins, L. L., Gilson, L. L., & Maynard, M. T. (2004). Virtual teams: What do we know and where do we go from here? *Journal of Management*, 30(6), 805–835.
- Moon, Y. (1999). The effects of physical distance and response latency on persuasion in computer-mediated communication and human-computer communication. *Journal of Experimental Psychology: Applied*, 5(4), 379–392.
- Napier, B. J., & Ferris, G. R. (1993). Distance in organizations. *Human Resource Management Review*, 3(4), 321–357.
- Pillai, R., Schriesheim, C. A., & Williams, E. S. (1999). Fairness perceptions and trust as mediators for transformational and transactional leadership: A two sample study. *Journal of Management*, 25(6), 897–933.
- Porter, L. W., & McLaughlin, G. B. (2006). Leadership and the organizational context: Like the weather? *The Leadership Quarterly*, 17(6), 559–576.
- Powell, A., Galvin, J. E., & Piccoli, G. (2006). Antecedents to team member commitment from near and far: A comparison between collocated and virtual teams. *Information*, *Technology and People*, 19(4), 299–322.
- Powell, A., Piccoli, G., & Ives, B. (2004). Virtual teams: A review of current literature and directions for future research. *The Data Base for Advances in Information Systems*, *35*(1), 6–36.
- Ross, J. A. (2006). Trust makes the team go round. *Harvard Management Update*, 11(6), 3–6.
- Schiller, S. Z., & Mandviwalla, M. (2007). Virtual team research: An analysis of theory use and a framework for theory appropriation. *Small Group Research*, *38*(1), 12–59.
- Staples, D. S. (2001). A study of remote workers and their differences from non-remote workers. *Journal of End User Computing*, 13(2), 3–5.
- Staples, D. S., Hulland, J. S., & Higgins, C. A. (1999). A self-efficacy theory explanation for the management of remote workers in virtual organizations. *Organization Science*, 10(6), 758–776.

- Straus, S. (1997). Technology, group process, and group outcomes: Testing the connections in computer-mediated and face-to-face groups. *Human-Computer Interaction*, 12, 227–266.
- Straus, S. G., & McGrath, J. E. (1994). Does the medium matter? The interaction of task type and technology on group performance and member reactions. *Journal of Applied Psychology*, 79(1), 87–98.
- Walther, J. B. (1996). Computer-mediated communication: Impersonal, interpersonal, and hyperpersonal interaction. *Communication Research*, 23(1), 1–43.
- Weisband, S., & Atwater, L. (1999). Evaluating self and others in electronic and face-to-face groups. *Journal of Applied Psychology*, 84(4), 632–639.
- Wilson, J. M., Straus, S., & McEvily, B. (2006). All in due time: The development of trust in computer-mediated and face-to-face teams. *Organizational Behavior and Human Decision Processes*, 99, 16–33.
- Workman, M., Kahnweiler, W., & Bommer, W. (2003). The effects of cognitive style and media richness on commitment to telework and virtual teams. *Journal of Vocational Behavior*, 63, 199–219.

CROSS-REFERENCES

The Evolving Nature of Work Teams: Changing to Meet the Requirements of the Future (50)

Flexible Labor (59)

Motivating Individuals and Groups at Work in the 21st Century (68) Leadership Style: Developing a Leadership Style to Fit 21st-Century Challenges (77)

Leadership in Interorganizational Networks (79)

Facilitating Mobile and Virtual Work (84)

Balancing the Implications of Employee Telework: Understanding the Impacts for Individuals and Organizations (85)

Leadership in Interorganizational Networks

Angel Saz-Carranza and Sonia Ospina New York University

Alfred Vernis

ESADE Business School, Barcelona

I think that there's power in that we're able to bring such a diverse group together. It's hard, it's really hard.

—Manager of an interorginizational network

Interorganizational networks are difficult to manage, as the quote above indicates. It is well known that managing interorganizational networks is an inherently difficult task and by no means an easy option. Scholars of business alliances estimate that more than 50% of alliances fail, and scholars have identified time and time again how collaboration often succumbs to problems and conflict. Networks are difficult to manage because they are complex. Scholars suggest that failures and the difficulty in managing interorganizational sets arise due to their managerial complexity and the dynamic and ambiguous nature of collaborations.

Although they are inherently difficult to manage, networks are popular mechanisms of interorganizational governance. This popularity can be attributed to today's complex world, which demands an organizational form of not only individuation and dispersed power but also unification. Moreover, problems nowadays are "wicked," neither easily definable nor decomposable. Problems themselves are ill-

defined, generating ambiguous situations, and they require complex solutions.

Despite the rising popularity of networks and their inherent challenges, however, network management and leadership is an understudied field. This lack of research is even more surprising when considering that interorganizational networks often fail due to poor management and that leadership is often suggested to be a central factor for network success. That interorganizational network management demands more research requires little justification: Interorganizational network management is in search of its paradigm, and until it develops one, network management will continue to have its shortcomings and, hence, networks will continue to fail.

This chapter wants to map out the field of study of interorganizational networks and, in particular, that of network leadership. It does so by focusing on the inherent paradoxical nature of networks and how it affects network

management. Networks fail and are difficult to manage because of the difficulties due to inherent paradoxes implied by networks, in particular the need to be simultaneously united and diverse. Here we look at how networks manage inherent tensions.

First, we define what we mean by network. Then we review research on networks, dividing it into four themes: structural characteristics and formation, process and evolution, performance, and management. Focusing on this last theme, we first highlight the complexities and tensions inherent to network management and then use paradox and power to understand the field of network leadership. We show how the unity/diversity paradox is inherent to networks and how its sustenance generates power for the network, which ultimately leads to network effectiveness. Drawing from our and others' research, we suggest leadership activities important to sustain the paradox and propose that just as networks will tend to become an increasingly important management issue in the 21st century, so will their leadership.

INTERORGANIZATIONAL NETWORKS: DEFINITIONS AND APPROACHES

Defining Interorganizational Networks

Prior to any reference to networks, it is imperative to define specifically what is meant by the term *network*, given people's huge proclivity to use that word in all aspects of academic discourse as well as in life. As Powell and Smith-Doerr (1994) pointed out, organization studies use *network* to refer to both an analytic perspective and a logic of organizing.

Network as an analytic perspective emphasizes the relational aspects of actors and uses the term as a metaphor

for conceptualizing and understanding social reality. This use of the term is exemplified by—but not limited to—the social network analysis methodology and supports the idea that actors may be best conceptualized as embedded in a network of social relations. This use of the term has been applied to all kinds of actors—individuals, organizations, and groups of either.

As a logic of organizing, networks have been contrasted to traditional forms of markets and hierarchies. These latter two forms have been the main conflicting images of governance modes—the means to govern the relationships between the different organizations. The market governs relationships automatically; the hierarchy does so by authority. Here, we use *network* as a concrete interorganizational governance mode—as a set of organizations relating to each other in a specific way.

Markets, Hierarchies, and Networks

The market has a first stage that consists of a competitive interaction between actors (buyers and sellers, in general terms) who bargain over opportunities over exchange of resources. In the second stage, actors agree over the bargaining and exchange the agreed resources. The market governance mode relies on contracts and property rights to function, and its principal means of communication is price. The resolution mechanism of conflicts between organizations in this mode is to resort to legal courts, and the commitment between parties tends to be low. Organizations are assumed to be totally independent actors.

In contrast, interorganizational relationships in hierarchical governance modes are based on employment relationships, and the main communicative means is routine. The conflict resolution mechanism used is administrative fiat (i.e., orders given by those holding authority), and the commitment among parties tends to be medium or high. With hierarchical governance modes, organizations are clearly dependent on each other.

According to Powell (1990), the third interorganizational mode, the network, is often thought of as a flat organizational form, which implies the idea of relations based on cooperation. Using his own key features to describe hierarchies and markets, Powell (1990) described networks as governance modes that use reciprocity and reputation as their main conflict resolution mechanism. The means of communication between organizations is relational, and the commitment between parties is medium-high. The network mode implies complementarity and mutual adjustment between organizations which are interdependent. The following table summarizes the characteristics of the three governance modes.

The definitions regarding the different governance modes presented by Powell refer to ideal-typical modes.

Table 79.1	Summarized Comparison Among Different Interorganizational
	Governance Modes

-			,
Key Features	Market	Hierarchy	Network
Normative basis	Contracts and property rights	Employment relationships	Complementarity and mutual adjustment
Means of communication	Prices	Routines	Relational
Conflict resolution mechanisms	Resort to courts	Administrative fiat	Reciprocity and reputation
Commitment among organizations	Low	Medium—high	Medium—high
Dependence between organizations	Independent	Dependent	Interdependent

SOURCE: Based on Powell, 1990.

In practice, when organizations interact they rarely do so uniquely and purely in one of these three modes. Different governance modes do, in fact, simultaneously govern the relationships among a given set of organizations (Lowndes & Skelcher, 1998). Three organizations may, in fact, relate to each other primarily through a network governance mode such as mutual adjustment, with high interdependencies and relational interaction as the main communication channels and all actors having high commitment among themselves; these organizations' interrelationships also may include features characteristic of other governance modes such as incorporating contracts into the relationships and delegating authority to one of the parties.

Building on Powell (1990) and other authors, the definition of interorganizational network we use in this work is a set of resource-interdependent organizations with autonomous decision-making mechanisms that negotiate and mutually adjust to each other and where relationships between organizations are continual, but finite, in time.

Different Types of Interorganizational Networks

Despite the previously stated definition of network, different types exist. Some networks may try to achieve common aims, while others may simply share information. Some may be formalized into specific structures, whereas others may be informal. Unfortunately, at present a commonly accepted typology of interorganizational arrangements is painfully lacking in the literature.

Knoke and Kuklinski (1991) tell us that relations are the building blocks of networks and, thus, networks may vary according to the form and the content of the relations between actors. Regarding form, networks may be based on informal and formal relations and may be more or less centralized.

On the other hand, the content of the relations is determined by the type of interaction between actors. In this sense, extending Alter and Hage's (1993) population-ecology-grounded typology, networks can exchange, coordinate, cooperate, and collaborate. Exchange networks only exchange information, and concerted-action networks coordinate and take into account other organizations. Cooperating organizations have joint productions only to achieve their own mission, while collaborative networks jointly produce to achieve a common aim.

SUBFIELDS OF INTERORGANIZATIONAL NETWORK RESEARCH

Faulkner and de Rond (2000) divided research on interorganizational networks into formation and structure, process, and management. We suggest a fourth area of study which has recently emerged and is rapidly gaining attention: network performance. Research so far has tended to concentrate on network formation and structures. In fact, most theories coming from the economic discipline—such as

strategic management (market power) theory, transaction cost, resource-based view, agency theory, and game theory —are best suited to explain network formation and static network configurations. Theories approaching interorganizational networks rooted in organization studies, except for resource dependence theory, are, in general, more behavior friendly. The interorganizational relations field has been one of the most relevant predecessors of present-day interorganizational network management (see Whetten, 1981 for a review of the field). Organizational learning has also contributed to our understanding of network management (see, e.g., Doz, 1996), as has the structurationist perspective, which is the basis of the renowned work of Kickert, Klijn, and Koppenjan (1997) on policy networks. Network theory (or social network analysis), on the other hand, is quite dynamically oriented, but it is best suited to explain variance rather than process.

The research streams that best address network management, however, are the public and policy networks (Agranoff & McGuire, 2003; Kickert, Klijn, & Koppenjan, 1997) and public-private partnerships (PPPs) fields (European Commission, 2003) grounded mainly in political science but also in economics and sociology. From within organization studies, the collaboration management literature (Gray, 1985; Huxham & Vangen, 2000) and the business alliance and network literature (Gulati, 1998) are the most relevant to network management.

Network Rationale: Formation and Structure

We agree with Ebers (1997)—and many other authors—that, at present, more is known regarding the factors influencing the emergence of networks than regarding their management, evaluation, and dynamics. Research has sought explanations for network formation and structure at an actor level—how actors' motivations lead them to network formation. Explanations to network formation have also been sought from a contingent factors perseptive, such as preexisting actor relationships and institutional and societal contexts in which networks are embedded.

Organizations may form or join a network to directly increase their efficiency and effectiveness. Businesses—and perhaps nonprofits and public organizations in some cases—may increase their efficiency and effectiveness by building networks that bind competitors into allies, generate economies of scale, and improve access to complementary resources. Reduction of uncertainties and risk, as well as enhancing one's legitimacy, also induce to network formation.

In the public and nonprofit sectors, problem-solving effectiveness is another catalyst of network formation, since the problems dealt with are often complex and overwhelm a single organization. In addition, in these sectors, an important motive for building and joining networks is to build power. Organizations get together to build their overall power and to ultimately improve their effectiveness. If two organizations are dependent on a more powerful third one,

the two weaker ones may join to counterbalance the stronger organization.

Contingent preconditions also induce network formation. At the institutional level, research has pointed out how legal, cultural, sectorial, and regional conditions impact the likelihood of network formation. Relational contingences such as social ties and interdependencies have also been found to induce network formation.

Another popular aspect of networks, researched aplenty, is when and why networks take on one specific structural design, rather than others. Hence, this area of the literature looks not only at why networks are formed, but also at why they are formed as they are—in line with the typological discussion mentioned earlier. Scholars studying this usually look at a network's actors (or membership in formal networks); relations including resources and activities; and the overall coordination mechanisms (such as how the unit that coordinates the network is and how decisions among members are made) and its objectives, when it has any. Although one may not have a specific inter-

est in why the network formed or what structural characteristics it possesses, both of these issues play an important role in the management of the network. Understanding why the organizations come together, what decision-making mechanisms the networks use, and what membership requirements they apply are important issues that will come up in different network leadership activities.

Evaluating Networks: Success, Performance, and Added Value

A disputed and developing arena on interorganizational networks is network performance, success, evaluation, and added value, despite that operationalizing these is a multidimensional and complex enterprise. This aspect is important to network management since leadership must contribute to network success. Success and performance, however, can be evaluated at different levels, using different criteria, and in reference to different actors.

First, taking a member organization as the point of reference, a network must be efficient, that is, the payoff for all actors pertaining to the network must be superior to going it alone. This is a necessary, though not sufficient, condition for a successful alliance (Jarrillo, 1993). Second, a network can also be evaluated with respect to its external stakeholders rather than its members. Evaluating networks at this broader level is relevant in public, nonprofit, and cross-sector networks. A third, intermediate level at which to evaluate networks is neither by its surrounding at large nor its members, but relative to itself. In fact, Gray's (2000) review on collaboration outcomes focuses at this level. She

Societal/Sector Level External Efficiency

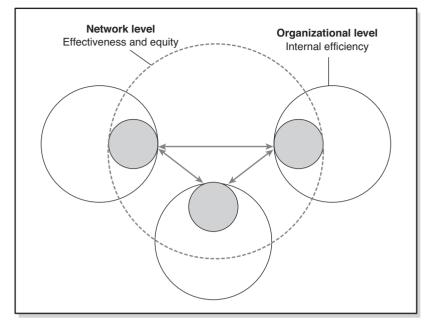


Figure 79.1 Network Evaluative Criteria and Levels of Analysis

identifies five different conceptual perspectives that assess the collaboration depending on the degree of problem resolution, trust generation, creation of shared-meaning, increased relational density, and power redistribution.

Networks also may be evaluated with respect to process, in addition to their outcomes. Ring and Van de Ven (1994) identify equity as a second criterion used to evaluate networks. Networks must be not only internally efficient, from a participant actor's point of view, but also fair. The concept of equity implies fair dealings based on reciprocity.

Network Process

The leadership of the network may vary with time, according to the moment in which the network finds itself. There are, however, different ways to conceptualize the moments a network goes through. Van de Ven and Poole (1995) identify four types of process theories: linear-sequential, teleological (repetitive circular), evolutionary (driven by environment), and dialectical. With regards to research in network process, it is the first two which have been most popular: the linear-sequential among public-private partnership (PPP) scholars and the teleological-circular within the alliance literature.

Despite the differing terminology, linear-sequential process theories are roughly composed of an emergence, evolution, and dissolution stage. In the evolution stage, actors start the "housekeeping" and "learning" as the network starts functioning, implementation takes place, and the relationship solidifies. The actors then recognize failures or changes within the network, which either produce changes

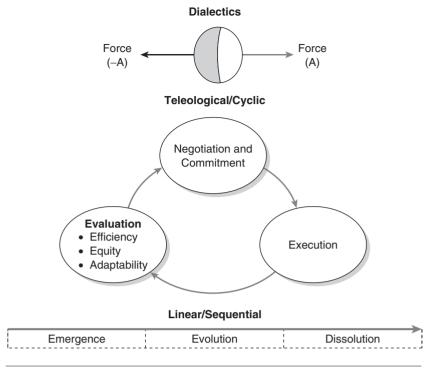


Figure 79.2 Network Process Theories

to the network's agreements and functioning or may, ultimately, terminate it (Kanter, 1994).

Teleological process theories complement linear-sequential process theories in that they propose cyclical microprocesses that represent the iterative interactions and dynamism present in all the linear stages. A cyclical approach consists of reiterative sequences of negotiation and commitment—where actors bargain and agree to rules—execution, and evaluation. As new situations are encountered and problems arise, the actors enter the negotiation stage again and will modify only those aspects perceived as problematic while retaining the other previously reached commitments in order to reach the negotiated goal (*telos is end* in ancient Greek, hence the term). Learning occurs throughout the cycle.

Another type of process theory is dialectics. With a dialectic process approach, alliances are conceived as continually moving between opposing forces such as unity and diversity, control and autonomy, construction and destruction, and cooperation and confrontation. Figure 79.2 illustrates the three main network process theories.

Network Management

Network management as used here encompasses different themes and areas of study. Using Agranoff and McGuire's (2003) and Huxham and Vangen's (2000) work, network management may be decomposed into leadership activities, power, trust, structure, membership, objectives, decision making, and accountability. Hereon, we first highlight the inherent complexities of network management

and then focus on leadership attending, in particular, to power issues.

Complexity and Ambiguity of Network Management

As we mentioned, networks are difficult due to their complexity and ambiguity. For example, insights about the factors that influence network formation, and the reasons why organizations decide to collaborate on or enter a coalition, point to the complexity of network management, with its intense resource consumption and inherent difficulties. Together, the variety of factors associated with network formation cited in the literature suggests that the resulting networks are the repository of a diverse and often contradictory set of expectations, aspirations, and goals. Ambiguity and complexity point toward tension in network management, as multiple, diverse goals must be advanced.

The relationship between common goals and the definition of success in a collaboration points to another source of tension:

Studies suggest that members of collaborations may hold diverse views about how to measure success (Provan & Milward, 1995). Coalition members often define successful coalitions in multiple ways, from achieving the goal or creating lasting networks and attaining longevity to gaining or acquiring such resources as recognition from the target, community support, new consciousness of issues, or new skills. This divergence in a context that requires convergence represents yet another source of tension.

The literature offers sufficient evidence on complexity as the source for dynamic tensions and contradictions and points to the paradoxical nature of networks and their management. For example, we know that collaborative efforts often arise to solve complex problems in dynamic social environments. Such problems involve uncertainty regarding not only the solution but also the definition of the problem itself (Koppenjan & Klijn, 2004), and collaborative efforts set up to address them are usually complex themselves. We also know that complexity affects network features such as membership and size. For example, membership structure is ambiguous and dynamic, given the different linkages among actors inside and outside the partnership. Ambiguity in membership stems from the fact that the same persons may represent different organizations in different arenas, and the role a person may be representing at a given moment may be unclear. Furthermore, members may not have clarity about who is executing a given activity at the moment: the network itself, one of its member, or even an individual acting independently from the network.

A lack of consensus exists around the effective number of organizations required for successful collaboration in a network. Kanter (1994) suggested that as many people as possible should be involved to bridge interpersonal and interorganizational differences in structures, processes, and skills. In contrast, others conclude that complexity must be kept low and, hence, membership numbers limited, and that strong trust relations may be maintained only with a limited number of actors.

The contradictory findings about trust in network relations represent yet another example of the existence of paradox in networks. Some argue that trust develops through personal and informal relations that later become formal and role based, an argument that follows traditional bureaucratic organization theory. In contrast, others suggest just the opposite causal logic in network relationship formation: Relationships are based first on roles, formal contracts, and agreements around network formation (fragile trust), which then turns into resilient trust as the network institutionalizes, giving way to personal relations, psychological contracts, and informal agreements and understandings that strengthen the networks over time and facilitate collaboration.

In sum, the relevance of complexity and tension in recurrent themes in the literature on network management—such as ambiguous membership, multiple aims and success criteria, and contradictory research findings on key themes such as membership size or relationships and trust—highlight that interorganizational networks imply certain inherent paradoxes that network leadership must address.

LEADERSHIP OF INTERORGANIZATIONAL NETWORKS

According to Chrislip and Larson (1994), collaborative contexts require different types of leadership and management than traditional intraorganizational contexts due to the boundary-crossing nature of collaborations (sector, organizational, and valorative boundaries), the lack of formal authority and hierarchy, and the blurriness of strategies. Leadership in collaborative contexts must be necessarily different, focusing largely on process, and has similarities to facilitative, transformative, and servant leadership—that is, to inspire commitment and action, to lead as peer problem solver, to build broad-based involvement, and to sustain hope and participation.

The role of leadership in generating and maintaining effective interorganizational collaboration has also been understudied; indeed many provokingly question if networks really are managed at all. Leadership in networks, however, seems of utmost importance.

Defining leadership in general is already a disputed terrain. For example, Heifetz and Laurie (1997) stated that getting people to do adaptive work is the mark of leadership, while Rainey (1991) defined leadership as the capacity of someone to direct and energize the willingness of people in social units to take action and achieve goals by drawing on legitimate authority. On our part, we follow Huxham and Vangen (2000) in defining leadership in more general terms

as "mechanisms that make things happen in a collaboration" (p. 1160). Such a definition of leadership, "mechanisms that make things happen in a collaboration," obviously goes against authors that draw marked lines between management tasks and leadership. We believe this distinction is far less useful in interorganizational networks given the shared-power setting and the inherently adaptive challenges they imply, which strongly reduce technical tasks that may be dealt with via managerial expertise and authority.

Traditional leadership studies based on trait, style, contingencies, and transformational approaches presume the existence of a leader and a follower and specified goals. The latter do not usually apply to networks, since authority and goals are usually a disputed terrain. If intraorganizational leadership involves a leader and a follower, interorganizational leadership hardly does so—indeed, Heifetz and Laurie (1997) argued that most interesting leadership happens without anyone experiencing being a leader and no one experiencing being a follower.

Here, we focus on activities and actions that make things happen rather than on individuals. We do not draw a hard distinction between management and leadership and see leadership as a collective phenomenon. Our approach is a relational approach to leadership. Compared to other relational leadership streams, it is similar to what Hunt and Dodge (2000) called systems-based and collective leadership but not to either social network analysis leadership or the leader-member exchange (LMX) perspective (see Hunt and Dodge for a review of relational approaches to leadership).

The systems-based and collective perspectives to leadership look, just as we do, at the overall dynamics of the group which allow it to perform. These perspectives are processual, and the collective perspective, in particular, does not give any individual a specific relevance. The social network analysis leadership perspective looks at the position of the leader in its environment, or network, and prescribes that strong leaders are those with most and best relations. Leader-member exchange leadership, on the other hand, conceptualizes leadership as a sum of transactions between the leader and its followers. In this view, leaders in groups maintain their position through a series of tacit exchange agreements with their followers. Only the leadermember perspective distinguishes between management and leadership, and both the social network analysis and leader-member approaches emphasize a leader and are not

The leadership of networks we describe later, however, differs from these relational leadership approaches since systems-based and collective perspectives have only been applied to organizations—not networks of organizations—and the LMX and social network analysis perspectives refer to leadership *in* networks. Network leadership may refer to two very different things. First, it may refer to the leadership of an organization embedded in a network—that is, leadership *in* networks. Network leadership, however, can also refer to leadership of the network, not that of a single

organization within the network. Here, rather than leadership *in* networks, we are interested in leadership *of* networks, which refers to how networks, as a whole, are led.

The Focus of Leading Networks

Leadership of networks, as we understand it, does not focus on individuals. Rather, it focuses on activities and actions that make things happen. Additionally, it does not draw a hard distinction between management and leadership and sees leadership as a collective phenomenon. Moreover, we see network leadership as primarily dealing with generating unity among the network members while preserving their diversity.

Diversity and unity of the network are both necessary for network effectiveness, but diversity often undermines unity by generating conflict and, hence, disunity. Successful networks are simultaneously united and diverse. This tension is always present in that the potential for diversity turning into disunity is always there: Unity and diversity conform to a management paradox in that they imply equally necessary opposing forces that generate a tension.

The paradox of unity/diversity essentially deals with the tension between the self and the collective. Paraphrasing Smith and Berg (1987), a [network] often needs [organizations] who are different to fulfill its primary task. This means that differences must be brought into the [network] and then integrated in a way that provides unity while preserving difference. Difference alone is enough to provide a platform for conflict, but the need to unify in light of difference makes it almost inevitable that conflict will occur. . . . Under these circumstances, the very fact that organizations contribute differences makes it possible for the group to be effective, yet these same differences threaten the network's capacity to function.

In other words, the potential for collaborative advantage depends on the ability of each partner to bring different resources. This needed diversity is, however, a function of differences in organizational purpose, which produces inherent tensions for collaboration.

Coalitions that are too unified resemble organizations and fail to achieve the essence of the coalition. Diversity slows progress toward goals, however, since it takes time to generate adjustments such as trust and familiarity.

The unity versus diversity tension may occur along different dimensions, according to Mizrahi and Rosenthal (1993). It may occur with goals either too broad—thus, misleading participants and being difficult to apply—or too narrow to attract members. The expected outcome, in particular when successes are achieved and benefits must be shared, is another dimension along which the unity-diversity tension manifests itself. The tension may occur as well along the power dimension, where unity generates power for the network but may be difficult to achieve due to power differences among members.

In sum, the unity/diversity paradox is inherent to networks, which must be diverse to have an added value with

respect to hierarchies but united to allow for concerted action of any kind, unlike markets. Leadership is about avoiding diversity and unity to undermine each other by respectively generating disunity and similarity. In order for a network to be effective, then, a network has to be diverse, be united, and, most importantly, avoid diversity turning into disunity.

Leadership Activities

Some agreement seems to exist on the type of activities—but unfortunately, not on the terminology—that must be carried out to manage collaboration. Drawing primarily on Agranoff and McGuire (2003) and Huxham and Vangen (2000), the different types of activities deal with actors and resources, interaction and structure, and the interior of the network and external environment of the network.

Facilitating aims at interaction among participants and is important, since interaction of diverse organizational members must be aided in order to avoid disunity and to build unity. It refers to managing the inevitable inequalities regarding participants and motivating participation by network members. Facilitation is making peace among members, supporting member involvement, and communicating to and with members. A major component, if not the core, of facilitation is facilitating decision making in the diverse networks, since these processes must be open and inclusive in order to avoid the "exit" of the autonomous member organizations. This is so because networks are made up of autonomous organizations that, when dissatisfied, are without an option to voice their dissatisfaction and are free to exit (or abandon) the network. An inclusive and open process, however, must be facilitated in order to avoid disunity due to power imbalances and disputes arising around, for example, benefit distribution.

Framing deals with network structuring. It aims at influencing institutions including rules and values and perceptions. Framing is about creating infrastructures for the collaboration and includes influencing rules, values, perceptions, and processes. If adequately done, by setting the operating structure, it allows for an interaction among diverse entities that does not turn into disunity but rather unifies. Framing deals with setting up the organizational procedures and is important in managing the unity/diversity paradox because it sets the platform for interaction. Common meaning making is an important part of framing, in which unity emerges by setting engagement rules, common norms, and a shared identity and vision. All in all, framing is an important unifying activity. Partners need a shared sense of correlated fate to function.

Activating deals with supporting actors who want to become members and with attracting needed partners. Activating plays an important role in managing the network, since it allows for the selecting and attracting of members who are diverse along specific organizational dimensions but are united around the network's metagoal, identity and experiences, and values. Activating is enhanced when the

network has legitimacy in the face of potential members—legitimacy that is, in turn, enhanced by the network's success record and its procedural inclusiveness. The possibility to meet other organizations and share experiences also attracts potential members to the network.

Mobilizing deals with capturing the necessary resources and support for the network. Mobilizing essentially builds network power—such as external legitimacy, knowledge, and access—from the network's domain.

Interaction and Structure

Network management implies managing the interactions between actors (the "games" where actors exchange resources and coproduce activities) and the overall network (Kickert, Klijn, & Koppenjan, 1997). While distinct, these two levels continually feed back into each other: Games are influenced by the network, rules, membership, relations, and resources and, in turn, influence the network by remodifying the interaction. Framing modifies the structure of the network, and facilitating addresses the interaction. Both activities, however, deal with the interior of the network. In addition, mobilizing and activating deal with the external boundaries and exterior of the network. In activating, actors are recruited or expelled; in mobilizing, resources and allies are looked for from without. This points to a second distinction of network activities—that between network and domain.

IO Network and IO Domain

Another management distinction that appears among the leadership tasks is whether they are focused at influencing

the network itself or the network's immediate environment, or domain, According to Trist (1983), an interorganizational domain is the set of organizations and the issues which bring them together. The domain of an interorganizational network is itself and the related public and private organizations that affect it and that it affects. Different scholars have highlighted the distinction between managing inward and managing outward. Most eminently, Moore (1995), in his famous book, divided public management into managing operations, managing the political environment and, somewhere in between, managing inward and outward, as well as managing the strategy and vision. Although this author referred to a single organization, the inward-outward distinction is also applicable to interorganizational networks. Networks not only manage formal member interorganizational interaction, but also manage the network's exterior environment, or its domain.

Figure 79.3 illustrates the activities and how the activities refer to either member interaction or network structure and network or domain.

Leadership and Power

Sustaining the unity/diversity paradox generates power, which increases the network's effectiveness. The networks sustain the unity/diversity paradox by activating members, facilitating interaction, and framing the structure (procedures, rules, and values). In addition, networks mobilize support. When activating, the network selects and attracts members who share certain experiences, values, and principles, but who are diverse regarding other organizational characteristics. Interaction and open decision making among the diverse members must be facilitated

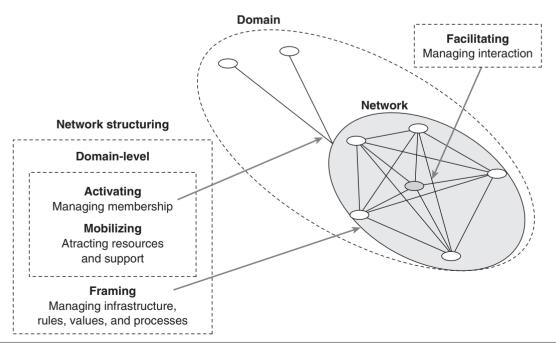


Figure 79.3 Leadership Activities SOURCE: Adapted from Agranoff and McGuire, 2003.

and members united by framing common procedures, rules, and values

The unity and diversity paradox is sustained to build the network power: Unity increases the ability of the network to get action by members, and diverse membership builds the resource base of the network. Without unity, the network cannot use its resources such as access, knowledge, legitimacy, and financial resources. The networks use the power built by sustaining the unity/diversity paradox to achieve their mission.

An additional way of understanding the leadership of networks—and yet another conceptualization of power—is to look at the power dynamics internal to them: decision making, nondecision making, and managing meaning. These three dimensions of power, respectively, regard how decisions are made, the issues around which decisions are discussed and made, and which assumptions of what is right and wrong are prevalent. Several scholars highlight that the internal power dynamics play a fundamental role in network management and leadership (Crosby & Bryson, 2005).

Facilitating is about managing decision making and nondecision making, and framing is about generating common meaning making. The facilitation of an open decisionmaking process hints at several points. First, whereas in intraorganizational settings, management is about decision making, in a network setting, management is about facilitating decision making, in that decisions are made not by the managing unit but by the network members. The managing unit facilitates rather than decides. The idea here is not to reduce uncertainty but instead to cope with it by incorporating openness and inclusiveness as a programmed routine. Second, the managing unit facilitates the process and does not control the outcome. This does not mean that the process is left to freely develop; rather, it prescribes positive manipulation and support routines—routines aimed at supporting decision making rather than making decisions.

Several scholars have highlighted the importance of facilitating decision making in networks. Similarly, managing common meaning making is also known to be important in networks (Koppenjan & Klijn, 2004) because in networks, the members' frames of reference are quite different, which makes formalized and rational decision-making rules less effective (Salancik & Pfeffer, 1974). Actors in a network have distinct mental frames of reference, which serve as a filter. The frame of reference ascribes, interprets, and makes meaning of the outside reality; it constructs the perceptions of the actors regarding reality. On the basis of these perceptions, actors then make their decisions and act. Actors go through a naming and framing process, which is, basically, meaning making.

Therefore, in order to accomplish joint decision making regarding solutions to social problems, a mutual adjustment of perceptions is essential. This implies that frames of reference must be minimally adjusted. A network, then, has to generate a common culture made of values, norms, customs, and rules. The network culture partially determines what and how games are played—that is, how ac-

tors interrelate. Scholars dealing with collaboration and conflict resolution reach similar conclusions. According to Gray (2000), different parties to a collaboration or conflict resolution team must "reframe." Reframing offers a minimum of joint meaning making to transform a deadlock to a potentially resolvable problem.

In brief, networks aim at building power, which means building the power and the ability to get action by members. While the network's diversity provides resources, unity allows the network to get action by members. The management of the network, however, must also take into account internal power dynamics, in particular, decision making, nondecision making, and meaning making. These have an effect on the unity/diversity paradox and, therefore, ultimately affect the leadership of networks.

CONCLUSIONS

This chapter has mapped the field of interorganizational networks and focused on one issue: network leadership. It has done so by approaching network leadership in a very specific way: overall leadership activities carried out by the networks. Moreover, we use the inherent paradox of unity and diversity and power to look at network leadership. Many other studies and approaches to leadership of networks are necessary and possible. For example, how is leadership divided within the network among the different individuals and why? What type of competencies do the network manager and its team have to possess?

Research on areas of studies, in addition to network leadership, is also needed. For example, an important, time-related aspect is the formation of the networks. How does such a foundational imprint affect posterior network management? What are important aspects of path dependence for network management? More research on interorganizational networks is necessary and should be carried out using all of the available empirical and theoretical tools of the trade.

NOTE

1. The business alliance and network literature has drawn from resource-based view (and the closely related organizational learning), strategic management, transaction-cost economics, game theory, and social network analysis.

REFERENCES AND FURTHER READINGS

Agranoff, R., & McGuire, M. (2003). *Collaborative public management: New strategies for local governments*. Washington, DC: Georgetown University Press.

Alter, C., & Hage, J. (1993). Organizations working together. Newbury Park, CA: Sage.

Chrislip, D. D., & Larson, C. E. (1994). *Collaborative leadership how citizens and civic leaders can make a difference*. San Francisco: Jossey-Bass.

- Crosby, B., & Bryson, J. (2005). New leadership for the common good. San Francisco: Jossey-Bass.
- Doz, Y. (1996). The evolution of cooperation in strategic alliances: initial conditions or learning processes? *Strategic Management Journal*, *17*(1), 55–79.
- Ebers, M. (1997). *The formation of inter-organisational networks*. Oxford, UK: Oxford University Press.
- European Commission. (2003). *Guidelines for successful publicprivate partnerships*. Brussels, Belgium: European Commission.
- Faulkner, D., & de Rond, M. (2000). *Cooperative strategy: eco-nomic, business and organizational issues*. Oxford, UK: Oxford University Press.
- Gray, B. (1985). Conditions facilitating interorganizational collaboration. *Human Relations*, 38(10), 911–36.
- Gray, B. (2000). Assessing inter-organizational collaboration. In D. Faulkner & M. de Rond (Eds.), *Cooperative strategy economic, business and organizational issues* (p. 243–60). Oxford, UK: Oxford University Press.
- Gulati, R. (1998). Alliances and networks. *Strategic Management Journal*, 19(4), 293–317.
- Heifetz, R. A., & Laurie, D. L. (1997). The work of leadership. *Harvard Business Review*, 75(1), 124–134.
- Hunt, J. G., & Dodge, G.E. (2000). Leadership deja vu all over again. *Leadership Quarterly*, 11(4), 435–459.
- Huxham, C., & Vangen, S. (2000). Leadership in the shaping and implementation of collaboration agendas: how things happen in a (not quite) joined-up world. *Academy of Management Journal*, *43*(4), 1159–1176.
- Jarrillo, J. C. (1993). *Strategic networks: the borderless organisation*. Oxford: Butterworth-Heinemann.
- Kanter, R. M. (1994). Collaborative advantage. *Harvard Business Review*, 72(4), 96–109.
- Kickert, W., Klijn, E.-H., & Koopenjan, J. (1997). *Managing complex networks*. London: Sage.
- Knoke, D., & Kuklinski, J. (1991). Network analysis: basic concepts. In G. Thompson, J. Frances, R. Levacic, & J. Mitchell (Eds), *Markets, hierarchies and networks: the coordination of social life* (p. 173–182). London: Sage Publications.
- Koppenjan, J. F. M., & Klijn, E.-H. (2004). *Managing uncertainties in networks a network approach to problem solving and decision making*. London: Routledge.

- Lowndes, V., & Skelcher, C. (1998). The dynamics of multi-organizational partnerships: an analysis of changing modes of governance. *Public Administration*, 7(6), 313–333.
- Mizrahi, T., & Rosenthal, B. B. (1993). Managing dynamic tensions in social change coalitions. In T. Mizrahi, & J. Morrison *Community organization and social administration advances, trends, and emerging principles* (p. 11–40). New York: The Haworth Press.
- Moore, M. H. (1995). *Creating public value strategic management in government*. Cambridge, MA: Harvard University Press.
- Powell, W. W. (1990). Neither market nor hierarchy: Network forms of organization. *Research in Organizational Behavior*, 12, 295–336.
- Powell, W. W., & Smith-Doerr, L. (1994). Networks and economic life. In N. Smelser & R. Swedborg (Eds.), *Handbook of economic sociology* (pp. 368–402). Princeton, NJ: Princeton University Press.
- Provan, K. G., & Milward, H.B. (1995). Preliminary theory of interorganizational network effectiveness: A comparative study of four community mental health systems. *Administrative Science Quarterly*, 40(1), 1–33.
- Rainey, H. G. (1991). *Understanding and managing public organizations*. San Francisco: Jossey-Bass.
- Ring, P., & Van de Ven, A. (1994). Developmental processes of cooperative inter-organisational relationships. *Academy Management Review*, 19(1), 90–119.
- Salancik, G. A., & Pfeffer, J. (1974). The bases and use of power in organizational decision making: The case of a university. *Administrative Science Quarterly*, 19(4), 453–474.
- Smith, K. K., & Berg, D. N. (1987). Paradoxes of group life understanding conflict, paralysis, and movement in group dynamics. San Francisco: Jossey-Bass.
- Trist, E. (1983). Referent organizations and the development of inter-organizational domains. *Human Relations*, 36(3), 269–284.
- Van de Ven, A. H., & Poole, M. S. (1995). Explaining development and change in organizations. *The Academy of Management Review*, 20(3), 510–541.
- Whetten, D. A. (1981). Interorganizational relations: A review of the field. *Journal of Higher Education*, 52(1), 1–28.

Challenges of Implicit Leadership Theories for Management

BIRGIT SCHYNS

University of Portsmouth, United Kingdom

JÖRG FELFE

University of Siegen, Germany

Then people meet a leader for the first time, they are not a blank slate. Rather, they have ideas as to what this person may be like and how he or she might behave. General ideas about what leaders are like and how they behave are called implicit leadership theories (ILTs). This term was introduced in 1975 by Eden and Leviatan. Although for a long time, leadership research and practice focused on actual leaders' traits and behaviors, the existence of implicit leadership theories is now widely acknowledged. This theory draws attention to the role of the follower in the process of leadership. Leadership is not only what a leader does but also what a follower makes of it. Research has focused on the contents of implicit leadership theories and their effects. In this chapter, after briefly introducing the most prominent concepts associated with the theories, the focus is on the latter, namely, an outline of how prior research may influence management decisions.

THEORY I: IMPLICIT LEADERSHIP THEORIES

Implicit leadership theories comprise ideas about leaders in general, and these are independent of what an actual leader is like or how one views one's own leadership. Implicit leadership theories are about images of leaders in general. What comes to your mind when you think of the term leader? Most of us are quite able to describe a person labeled as leader without ever having met this person. This is because we have a strong idea of what characteristics certain groups of people possess as part of their group membership. To offer another example, you may have specific ideas about a typical football manager, a politician, a teacher, or a pilot. Think about typical clothes they wear, what they look like, and how they will probably behave. Moreover, you will have some ideas about their traits and attitudes. These attributes that are associated with any member of a particular group are called schemata and stereotypes. They may or may not be true. The most important thing is that these schemata guide our perceptions of others, and we use them automatically in our judgment of a person we hardly know. Recall that many people articulated serious concerns about whether a fair-haired actor like Daniel Craig could adequately fill the role of James Bond that had been shaped by Sean Connery. Long before the movie was out, there was a discussion in the media if this man is tough enough. Obviously, in many people's minds there exists a clear implicit theory of the characteristics of a royal spy. As in everyday life, only with more knowledge of a person, we can overcome our stereotypes. So, remember, the actual person you meet who is a leader may or may not correspond to your image of leaders in general. We can easily imagine that it makes a difference for our acceptance and our behavior toward a leader if we recognize him or her as a leader or not.

So far, research into implicit leadership theories mostly refers to ideas about effective leaders. However, in public there are also quite negative images of leaders. Think of the cartoon character Dilbert to understand the idea. The image conveyed here is that bosses are generally incompetent.

Although implicit leadership theories of effective leaders may differ between persons, some aspects seem to be culturally shared. Using questionnaires, a large project called Global Leadership and Organizational Behavior Effectiveness (GLOBE; see, e.g., House, Hanges, Javidan, Dorfman, & Gupta, 2004), found that charisma is a characteristic that most people in different cultures think of when they think of an effective leader. Note, however, that qualitative interview studies showed some cultural difference with respect to the ideas people have of effective leaders (cf. Ling, Chia, & Fang, 2000; Offermann, Kenedy, & Wirtz, 1994).

Another interesting phenomenon in the line of implicit leadership theories is the tendency we all have to attribute company performance to leaders. This is what James Meindl (1990) introduced as the *Romance of Leadership*. Just think of your favorite sport team and what happens when they lose. Very often, in the case of failure the blame is put on the coach. Just as when the opposite happens, the coach is praised as a local or even national hero. This, however, ignores other influencing factors (in companies as well as in sport teams), such as the economic situation, legal constrains, and so forth. The most important concepts that are related to implicit leadership theories are briefly outlined in the following sections.

Social Construction and Information Processing

Given the fact that leadership is shaped by the followers, the question must be raised as to what are the underlying psychological and social mechanisms. To give an example, you may imagine that you have been appointed to be a member of a project team that has to accomplish a difficult task in your company. You have met neither the other members nor the leader of the group. When entering the conference room where the kickoff meeting is going to start, you find people still standing around and talking to each other. As you do not know anyone in the room, you may need some orientation. One source you expect to get some orientation from is the leader of the group. Therefore, you are looking around to identify this person. Our implicit leadership theories that consist of structures in our mind or memory contain typical traits and behaviors of leaders (Eden & Leviathan, 1975). These cognitive structures or schemata are always made salient when we are confronted with leaders or situations where leadership plays an important role (Lord, de Vader, & Alliger, 1986). These cognitive structures consist of categorization systems that help to distinguish between leaders and nonleaders in a specific situation. According to this system, a typical leader may be older than you are, male, and wearing more formal clothes like a jacket and a tie. Moreover, a leader will not stand alone. Instead, a leader is expected to be with others and talk to them, while the others are expected to listen. These attributes may characterize a typical leader in a specific situation. The image of a typical leader is like a prototype. Prototypes of leadership are a key concept for categorization. If someone in the scene mentioned previously matches our categories or cognitive schemata of leader prototypes, this person will be recognized as a leader, whether or not, of course, he or she is the leader (Lord, Foti, & de Vader, 1984). Categorization and recognition are two important steps in our information processing. If this person in the situation mentioned previously speaks, goes to the front desk, and so on, we would pay attention, sit down, and listen to what he or she has to say. Probably we are ready to accept and support this person because he or she is the leader in this situation. In doing so we start to behave like followers and help with the social construction of leadership. Now, imagine that a quite different type of person opens the meeting. Probably you will be astonished that this young guy was assigned to be the project leader. As a consequence, you might hesitate to attribute competence and remain skeptical of his abilities. It is important to be aware of the fact that it might be hard for the leader to initially gain confidence and authority if most members share similar expectations toward a leader that are not met in the particular case. Instead of the leader being enabled, we would not be surprised if he failed.

Another setting that makes the idea of the social construction of leadership even more evident is a group without a formal leader. After a short period, a leader will emerge. Research has shown that those who meet leadership categories in general and represent the prototype of the group will become leaders by receiving reinforcement and support. Their influence is accepted, though there was no formal assignment or any kind of election.

What are the characteristics that typically match leadership prototypes? From research on the emergence of leadership, there is considerable evidence that potential leaders' characteristics such as sensitivity, dedication, tyranny, charisma, attractiveness, masculinity, intelligence, and strength are associated with effective leadership (Offermann et al., 1994). Therefore, a group looking for someone to fill the leadership position will probably choose the person that best represents these categories. However, we have to keep in mind that the characteristics that make a successful leader in the minds of others may be different in different cultures. This is underlined in a Chinese study (Ling at al., 2000) which found that their Chinese participants named characteristics such as personal morality, goal effectiveness, interpersonal competency, and versatility as important for effective leadership. That means that implicit leadership theories not only differ between persons, but are also influenced by culture. We will come back to this point later in this chapter.

Social Identity Theory

For a more differentiated perspective, the social identity theory (Tajfel & Turner, 1986) proposes that to some extent the schemata and categories that differentiate leaders from nonleaders are not static. Social identity theory proposes that they will be continually rebuilt as new information is available or as the task and context change (Hogg, 2001; Lord, Brown, Harvey, & Hall, 2001; Lord & Emrich, 2000). Studies conducted within the frame of social identity theory were able to show that the emergence of a leader is based on her or his "prototypicality" for the characteristics of a group in a specific situation (Haslam & Platow, 2001; Nye, 2002). To give an easy example, one can imagine the same group of persons from the previous example without a formal leader in quite different situations. One situation is in the work context where the group has to plan a marketing strategy for the introduction of a new product. The other situation is on a hiking tour in the mountains after the group has lost their way and it is getting dark. In the first situation qualities like specific market knowledge, social skills, ambiguity tolerance, and creativity are crucial for the success of the group; therefore, the person who has the best match with this profile probably will emerge as the leader. In the second situation, someone else will probably get into the leading position. The group will look for the member who best represents physical strength, fitness, wilderness and outdoor experience, and emotional stability.

Culture and Implicit Leadership Theories

It is argued that people within one culture share a common set of categories that characterize a prototypical leader (House et al., 2004; Lord, 1985; Shamir, 1992). According to Offermann et al. (1994), we can assume that sensitivity, dedication, tyranny, charisma, attractiveness, masculinity, intelligence, and strength are associated with effective leadership in the United States; according to Ling et al. (2000) personal morality, goal effectiveness, interpersonal competency, and versatility are important for effective leadership in China.

However, results from the GLOBE study show that beyond individual and situational variability, there appear to be universal elements of implicit leadership theories. The GLOBE project assessed implicit leadership theories in 62 different countries (House et al., 2004). They asked 17,370 managers from 951 organizations to indicate for different characteristics how far they contribute to a person being an outstanding leader or inhibit a person from being an outstanding leader. The image of an ideal leader in a specific culture is based on the culturally endorsed leadership theory (CLT). On the basis of 62 countries, 10 regional clusters with common language, history, and religion were formed—for example, Anglo (United States, United Kingdom, Canada), Germanic Europe (Germany, Netherlands, Austria), Latin Europe (France, Italy, Spain),

Eastern Europe (Greek, Russia, Poland), Confucian Asia (China, Hong Kong, South Korea, Japan), and Southern Asia (India, Indonesia, Thailand).

Overall, six dimensions of culturally endorsed leadership theory were identified: (a) charismatic/value-based, (b) team oriented, (c) participative, (d) humane oriented, (e) autonomous, and (f) self-protective. The results indicated that charismatic or value-based leadership and teamoriented leadership are prominent dimensions of effective leadership theories worldwide. Participative and humaneoriented leadership are also endorsed in many countries, whereas autonomous and self-protective leadership were considered as neutral or even negative for effective leadership. The comparison of country clusters reveals, for example, that in countries from the Germanic Europe cluster, participative leadership is highly appreciated, whereas in countries from the Confucian and Southern Asia clusters, participative leadership is less emphasized. A reversed pattern shows up for self-protective leadership. This kind of leadership is highly endorsed in Asian countries and less appreciated in the Germanic Europe cluster (House et al., 1999; House et al., 2004).

Self-Concept

So far, we have argued that, to some extent, leadership categories are universal, and to some extent, they are only valid within one culture. We also pointed out that the context and the task influence which categories will be salient. Current studies in the area of self-concept research have added one more factor that explains which categories are preferred. According to Keller (1999), followers' self-concepts are related to the idea of the characteristics of an ideal leader. She found that the ideal leader is construed as similar to the self. Imagine a person who is extroverted, prone to risk taking, and very communicative. For such a person, an ideal leader should be at least as tough. For followers who do not share these characteristics, this kind of leader would be overdemanding and therefore not representative of their idea of an effective leader. Romance of leadership as an implicit leadership theory is also influenced by followers' personalities. Persons who rate themselves as similar to leaders in general on specific traits (e.g., extraversion) are more prone to romanticize leadership. This concept is described in the next paragraph.

Romance of Leadership

Besides categorization, attribution plays a crucial role in implicit leadership theories. This means that we have assumptions of what can result from leadership in terms of consequences. On the other hand, we have an idea of what event probably has been caused by leadership and not by any other reason. Accordingly, not only do people ascribe leaders certain characteristics, they also assume a relationship between success and leadership (Meindl,

Ehrlich, & Dukerich, 1985). That means that if a company is successful, its leaders are often considered the origin of this success. Factors outside the control of leaders such as the general economic situation or legal issues are usually ignored or thought to be less important compared to leadership. We might say that leaders are considered almighty.

The process we just described has also been called the social construction of leadership. Although in many cases we do not know about the actual influence of a leader, we just assume he or she is responsible for the company's performance. This is what Meindl (1990) called romance of leadership. Our image of leaders in general tends to be rosy, and we ascribe them more influence than they actually have (remember the sport teams). Interestingly, this effect is quite common. Especially in times of extraordinarily good or bad company performance, the focus is on the leader. Meindl and colleagues (1985) confirmed this in business journals as well as in dissertation topics.

Romance of leadership can also be understood from an information-processing perspective. It helps people to structure and to make sense of organizational phenomena that are complex, ambiguous, and difficult to understand (Meindl et al., 1985; Shamir, 1992). Leadership serves as a plausible category for a better understanding and a sense of control with regard to failure and success in organizations. This tendency may be reinforced by the fundamental attribution error (Ross, 1977), which implies that people in general tend to focus on the role of personal causes and underestimate situational factors. The need of followers to understand and make sense of things is particularly high in cases of unexpected success or failure.

THEORY II: EFFECTS OF IMPLICIT LEADERSHIP THEORIES IN ORGANIZATIONS

Knowing that we all have implicit leadership theories in mind leads to the question of what effects these implicit leadership theories have. In the following section, we will summarize a few that have been mentioned in prior research. The effects of implicit leadership theories in organizations comprise effects on the perception of actual leaders, on the satisfaction and performance of followers, and on leaders' careers.

Perception of Leadership

With respect to the effects of implicit leadership theories on the perception of leadership, research has mainly focused on the perception of charisma. The reason for this is simple: We all know charisma when we see it, but it is difficult to describe. So, one could argue that charisma is open to projection. This means that regarding a leader as charismatic could be dependent on the observer as well as the leader.

- Perception
- Satisfaction
- Performance
- · Careers
- Decision making

Box 80.1 Effects of Implicit Leadership Theories

Recently, Schyns, Felfe, and Blank (in press) conducted several studies and a meta-analysis (that is a quantitative review of prior research) on the relationship between romance of leadership and the perception of charisma. They indeed found that romance of leadership is related to the perception of charisma, meaning that across several studies with different contexts, conducted in different countries, how charismatic a leader was regarded depended on the strength of one's tendency to view leaders in a romantic way.

Satisfaction and Performance

Another line of research has focused on the effects of a match between followers' implicit leadership theories and leaders' behavior. So, now we are not talking about how the perception of a leader is shaped by our implicit leadership theories, but in how far the degree of match between our implicit leadership theories and the traits and behaviors of a real leader affects how much we like this leader. Nye (2005; Nye & Forsyth, 1991) has undertaken experimental research showing that a mismatch between followers' implicit leadership theories and leaders' behavior has negative effects on followers' rating of that leader with respect to good leadership and with respect to performance. Nye's (2005) experiment was conducted as follows. She first asked students to indicate (using ratings on several characteristics) what characteristics a student with good leadership qualities would have. The participants then executed a task under the leadership of a colleague of the researcher. Subsequently, they were asked to indicate their perception of this leader. It turned out that those leaders who matched the implicit leadership theories of the participants were evaluated better than those who did not match their implicit leadership theories. That means that when an actual leader does not act the way we expect a leader to behave, our estimation for this leader

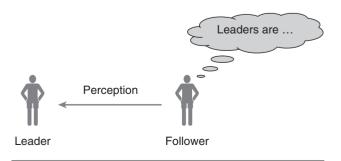


Figure 80.1 ILT and the Perception of Leadership

goes down. This has very important consequences for leaders themselves as is outlined later in the chapter.

Performance Evaluation and Gender/Culture

In order to find out more about the effects of implicit leadership theories on the evaluation of leaders, we can look into research on gender and leadership. Heilman (1983, 2001) introduced the "lack of fit" idea, referring to the assumption that stereotypes of women and stereotypes of leaders (or implicit leadership theories) are incongruent. That means women can behave like women, in which case they are believed not to be suitable as leaders, or they can behave like leaders, in which case they violate gender stereotypes. Both processes lead to a devaluation of female leaders. Similarly, Schein's (1973, 1975) approach, the "think-manager-think-male" phenomenon, refers to the fact that when people think of managers, they think of men rather than women, and that for most people, leadership characteristics are male rather than female. In essence, when implicit leadership theories do not fit the female stereotype, this can and does lead to lower performance evaluations and, in the end, lower promotion chances for women than for men.

Implicit leadership theories also have an effect on the evaluation of leaders across cultures. Although some characteristics of successful leadership seem to be spanning across cultures, other evidence suggests that there are some differences among cultures with respect to the ideas people have about what makes a successful leader. This is important for leaders who work in different cultures or who move from one culture to another. As we have seen, the match between implicit leadership theories and actual leader behavior influences followers' evaluations of their leaders. This means that a leader can be highly valued in one country but considered unacceptable in another.

Performance Evaluation in General

What we have said so far about the effects of implicit leadership theories for performance evaluation and careers of leaders, leads us to explain some general effects of expectations on the rater and the rated person.

First, there is an effect that we call the *Pygmalion effect*. This name goes back to Greek mythology. The Greek sculptor Pygmalion carved a sculpture, Galatea, and fell in love with her. The goddess Venus took pity with him and turned Galatea into a real woman. Nowadays, the Pygmalion effect refers to situations in which an evaluator treats a person in a way that makes his or her assumption about this person come true. Rosenthal and Jacobson (1968) first reported this effect in classrooms where teachers gave students, of whom they thought highly, a greater chance to contribute to the lesson. Similarly, we can assume that if someone thinks highly of a person (i.e., ascribes this person leaders' characteristics) he or she may give this person more opportunities to contribute to the organization and, ultimately,

reach a promotion. Of course, the opposite is true as well. If people are not perceived as leaders, they may be given less opportunities to prove themselves.

The astonishing thing is that stereotypes or ideas others have of us influence our own behavior. That means that not only are we treated differently depending on the images of others, but also our own behavior may change as well. This is due to an effect we call "stereotype threat" (Spencer, Steele, & Quinn, 1999). Going back to the gender example, this means that women whose experience is that others believe they do not have leaders' characteristics, may, in the end, not show these characteristics. They fulfill the prophecy themselves. Imagine a woman who is assigned to a leading position in a department of a bank. Her new boss is very friendly and warm when meeting her for the first time promising any kind of support she requires. He also tells her, however, that it might be difficult for her as a woman to run that department successfully, because the communication among the men is often relatively rough, and he has doubts if they can behave like gentlemen. Imagine that you were in her place. How encouraging is this message, and how would you communicate with your team when starting your job? Furthermore, what can we expect if any problems occur in the team?

Career

On a more general level, Schyns (2006b) suggested that implicit leadership theories not only affect the evaluation of female leaders but also those of leaders in general when they do not fit the prevalent implicit leadership theories in their organization. More importantly, she suggested that besides the immediate evaluation of leaders, their promotion chances might suffer if they do not fit their followers' or supervisors' implicit leadership theories. Remember Nye's research cited previously. Here, followers rated leaders lower when they did not fit their implicit leadership theories. When decisions about promotions of leaders are made and follower ratings are taken into account, leaders who do not fit will have lower chances of promotion (see Figure 80.2). Similarly, supervisors hold implicit leadership theories and may give leaders who do not fit their implicit leadership theories lower promotion chances.

Decision Making

How far do implicit leadership theories not only influence followers' perceptions and judgments but also guide managers' decisions? As pointed out previously, a perceived misfit between implicit leadership theory and leader behavior may influence managers' decisions in a way that negative consequences for low-level leaders' career development can be expected. Felfe and Petersen (2007) extended this approach, as they claimed not only that followers' perceptions and attribution of leadership are determined by implicit leadership theories, but also that the behavior of top managers, CEOs, executive board

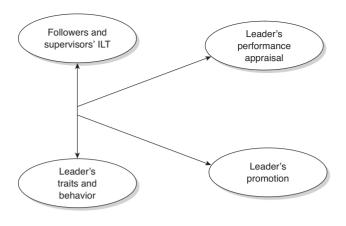


Figure 80.2 ILT Match and Evaluation and Promotion

members, and other stakeholders is influenced by their respective implicit theories of leadership. In particular, they postulated that romance of leadership will influence top leaders' behavior in terms of decision making. In their decisions, they assign responsibilities, tasks, and resources to a specific leader. These decisions are supposedly influenced by the degree to which a leader meets their expectations and how important the role of leadership is considered in general. According to the romance of leadership theory, Felfe and Petersen argued that persons who believe that a leader's capability is the core factor for success or failure, as proposed in the theory, will tend to base their decision for an enterprise or a project on the evaluation of the leader rather than on alternative factors. Whereas the influence of other factors is de-emphasized, the influence of leadership is overemphasized.

Think about the following situation as the participants in the study were asked to do. Imagine you are a member of the executive board of a midsize, prosperous pharmaceutical company and you are preparing for tomorrow's board meeting. There are a lot of decisions on tomorrow's agenda and you have some project proposals that are going to be discussed and decided. One project, "Vectra C+" for example, is on developing a new medicine for the European market. Experts say that for reasons of demographic development, an increased demand can be expected. Moreover, there will be political and financial support from the local government. To sum up, the prospects of success for Vectra C+ in the given situation are relatively high. However, the leader designated for this project, Mr. Cohen, is not very experienced. His performance appraisals only reached average level in the past, and some subordinates have complained about his leadership style. You will probably find it difficult to decide whether you would approve or would not approve this project, because on the one hand, the situation seems to be very favorable, but on the other hand, the probability of success of the leader designated seems to be limited. Before deciding, you may want to have a look at another project proposal. The project "Triple A" is building a new factory in an African country. This means costs for transportation and production will decrease significantly.

However, some experts have articulated some concerns. Corruption can be anticipated, and the recruitment of a qualified workforce will be difficult. Moreover, analysts say that there is severe competition in this specific market. The leader designated for this job is Mr. Bem, who is an experienced project manager. He is a convincing personality, followers are enthusiastic about his management style, and he has considerable diplomatic capabilities to deal with local authorities. In the past, he has made nearly every project a success. How would you decide on this project? Which of the projects would you prefer?

In Felfe and Petersen's (2007) study, participants were presented a set of short descriptions of proposed projects such as Triple A and Vectra C+ mentioned previously. They were asked to make a decision for each of them on the basis of the information provided. As you might have already guessed, two factors have been systematically varied: the probability of the success of the leader and the probability of the success of the situational context. Their results clearly showed that the approval of a project was higher when the leader's probability of success was high and the situation was more unfavorable (as in Triple A) than in situations where the leader's probability of success was low but the situation was favorable as in project Vectra C+. The fact that participants relied more on the leader's probability of success corresponded with their individual assessment of romance of leadership. In general, participants in the study who scored high on romance of leadership approved projects to a greater extent if the leader's probability of success was high, and approved projects to a lower extent if the leader's probability of success was low.

Although participants' decisions are based on both sources of information—the leader and the situational context—the findings provide evidence that the information about the leader is more influential than the information about the context. These results support the romance of leadership theory, which proposes that the role of the leader is overemphasized and circumstances are neglected.

APPLICATION: CHALLENGES FOR MANAGEMENT

When regarding the previously cited results of the effect of implicit leadership theories, we can see that these are serious and, therefore, implicit leadership theories need to be taken into account by managers. In an organization, different issues arise from the knowledge of implicit leadership theories. Some of these are sketched out later in the chapter.

360-Degree Feedback

Knowing the effect of implicit leadership theories on the perception of actual leaders challenges 360-degree feedback in several ways. First, feedback based on the average of follower ratings may not be accurate. When follower

(and supervisor) ratings are influenced by implicit leadership theories, their ratings cannot be taken at face value. Rather, it is important to find out about the effects implicit leadership theories have had on those ratings in order to be able to give fair and accurate feedback to leaders.

Second, the variance in follower ratings is meaningful. This means that when followers view the same leader differently, this can serve as an important piece of information on how to motivate and stimulate individual followers based on their implicit leadership theories.

Enhancing Satisfaction and Performance

As outlined previously, a mismatch between followers' implicit leadership theories and leaders' behavior can have serious consequences for followers' satisfaction and performance. The task of management is to prevent the negative effects of a mismatch. One way of doing so is careful placement and training. Especially, in intercultural leadership, making the leader aware of different expectations can enhance the interaction between leaders and followers and overcome the negative effects of a mismatch.

Another strategy may be to make implicit theories explicit and examine their influence on communication and cooperation in organizations. Survey feedback or team development processes enable leaders and followers to reflect and communicate upon their respective theories on leadership and followership. In doing so, mutual expectations can be articulated. Points of agreement and discrepancies become obvious and can be clarified. Unrealistic follower expectations of their leader can be corrected, and misunderstandings can be solved. Leadership guidelines and executive training may also help to facilitate overt communication between leaders and followers.

Fairness in Promotion Decisions

Assuming that, because they do not match their supervisors' or their followers' implicit leadership theories, leaders may not be promoted to higher positions has risks for fairness in promotion decisions. Promotion decisions should be generally based on performance, not on biases toward certain traits and behaviors. Fairness and putting the right person in the right place are crucial in organizations which may otherwise lose important resources and experience diminished success. Again, it is important to make decision makers aware of the possible influence of implicit leadership theories on promotion decisions. A more standardized procedure in selection and promotion decisions can also help to improve the decision-making process. If less room for individual interpretation is left in these decisions, they are less vulnerable for biases.

Making the Right Decisions

In general, there is no doubt that decisions may be less effective when situational information is neglected and only the information on a leader is considered relevant since there is a high risk that organizations overlook important chances or underestimate risks. Considering the effects of romance of leadership on decision making, it is important that decision makers in organizations are aware of this general tendency and their individual implicit leadership theory in order to avoid serious flaws when making decisions. It is possible that a company may lose future market opportunities. Persons are more likely to reject a promising project if the leader does not meet expectations. In other cases, direct damage and financial loss for the organization may occur when risks are underestimated. Even when provided with many strong arguments for the rejection of a project, people seem to believe that there will still be a considerable chance for the project if only a competent leader is in charge. It is doubtful that an implicit leadership theory that overemphasizes the importance of the leader is appropriate for complex managerial settings. Therefore, managers in organizations should be advised not to neglect important information about the context and thereby engage in questionable projects. Accordingly, Felfe and Petersen (2007) argued that coaching, training, and case studies should be used as methods for managers and executives to reflect on their implicit theories and improve their decision making.

Avoiding Cultural Misunderstandings

Given that implicit leadership theories are different in different cultures, the effect and reactions leaders will evoke in different cultures may not be comparable. This means that leaders' success may not be transferable between cultures. Leaders should be aware of the different expectations and different effects they have in different cultures. Intercultural training or so-called cultural intelligence (Earley & Ang, 2003) can help overcome problems of a mismatch between a leader and the implicit leadership theories of his or her followers.

FUTURE DIRECTIONS

In terms of the development of implicit leadership theories, we know that implicit leadership theories develop early in life (Ayman-Nolley & Ayman, 2005). Already young children can draw leaders and develop individual differences in their images of leaders. Also, research has shown that implicit leadership theories are related to personality (Felfe, 2005). In particular, self-esteem is related to romance of leadership, that is, the tendency to (over-) attribute responsibility for company performance to leaders. However, although there seem to be some stable factors involved in explaining why implicit leadership theories differ for individuals, little is known yet about possible changes and developments of implicit leadership theories. Epitropaki and Martin (2004) found that implicit leadership theories are stable in times of leader change. As they

also found differences between types of organizations, we may assume that socialization plays a role in the development of implicit leadership theories. More research is needed on issues such as which crucially affects implicit leadership theories have or how much time implicit leadership theories need to change, for example, in case of a change of profession.

As mentioned before, implicit leadership theories are not independent of culture. In the future, given increasing globalization, this point will receive growing importance. As more and more managers work in different cultures, their awareness of the different implicit leadership theories they may be confronted with can become a crucial indicator of the success or failure of international assignments or cross-cultural leadership. Obviously, this point will not only be more important when cultures that differ significantly are involved (e.g., the United States and China), but also when similar cultures are involved (e.g., the United States and the United Kingdom); differences in implicit leadership theories should not be underestimated.

SUMMARY

In summary, we can say that implicit leadership theories play an important role in organizational processes even if more research is needed. We have seen that the perception of an actual leader and his or her evaluation may be influenced by implicit leadership theories. In addition, decision making is not free of bias. For organizations, it is therefore crucial to learn about the effects of implicit leadership theories and also to learn how to avoid them.

ASSIGNMENTS

Contents of Implicit Leadership Theories

Imagine we invite you to a party tonight. You will meet the CEO of Royal Dutch Shell. What is this person like? Talk to one fellow student and discuss your ideas for ten minutes. Write down characteristics and behaviors that come to your mind.

Discuss the characteristics in class. Leading questions are as follows:

- · What characteristics come up the most?
- Are there characteristics one can label as general leadership characteristics?
- How are the characteristics you collected related to your own cultural background?
- How much do the characteristics you collected match your own personality?
- How are they related to your assumption about somebody leading a Dutch company?

Levels and Effects of Implicit Leadership Theories

Get together with three other students and discuss implicit leadership theories. Each group is assigned a different topic. Allow 20 minutes for each group. Some leading questions are outlined for each group:

- Group 1: How do implicit leadership theories affect followers? What if different followers of the same leader do not agree in the implicit leadership theories?
- Group 2: How do implicit leadership theories affect organizations? Do you expect differences in implicit leadership theories in different types of businesses? If so, what if a leader moved between companies?
- Group 3: How do implicit leadership theories affect societies? In a historical context, how have ideas about successful leaders changed over the last 50 years? You can think of political leadership here as well.

Present the results to the other students and discuss how you can overcome negative effects of implicit leadership theories.

Own Leadership Experience

Especially in the beginning of leadership experience (as a leader or a follower), implicit leadership theories may clash with reality, so we now turn to your own leadership experience. Get yourselves together in pairs and interview each other. Pick one of the following questions depending on your own experience.

- Alternatively, what was your first experience as a follower? Describe the situation and how you experienced it.
- Use the following question to assess your own leadership.
 You are currently in a management position. I would like
 to ask you to think back and to tell me about your first experience as a leader. What happened? What did it mean to
 you? How did you experience it? (adapted from Endrissat,
 Müller, & Meissner, 2005)

For both questions, try to remember how you felt about this experience. Were you disappointed? Were you positively surprised? Discuss your experience in class. Are they common topics or did everybody experience his or her first leadership situation differently? What are the differences in views between leader and follower experiences?

Awareness of ILTs

First, collect a number of basic assumptions on leadership. It may be helpful to complete some of the following sentences:

Most people think that leaders can always . . .

- Most people believe that leaders are responsible for . . .
- I would be glad to be in a leadership position, because . . .
- In general, leaders have always the problem that . . .
- If someone from a completely different culture observes leaders and followers, he or she would wonder why . . .

Second, discuss how much you agree upon the different points and make a ranking according to the order of agreement. Select the top points for a deeper analysis in small groups.

Third, discuss in small groups the chances and risks that emerge from the selected points with at least one group member taking the perspective of a leader and another taking the role of a follower.

Fourth, find concrete solutions that help to overcome and avoid these risks on the one hand, and help to put the chances into practice on the other hand.

REFERENCES AND FURTHER READINGS

- Ayman-Nolley, S., & Ayman, R. (2005). Children's implicit theories of leadership. In B. Schyns & J. R. Meindl (Eds.), *The leadership horizon series: Implicit leadership theories—Essays and explorations* (Vol. 3, pp. 227–274). Greenwich, CT: Information Age Publishing.
- Earley, P. C., & Ang, S. (2003). *Cultural intelligence*. Stanford, CA: Stanford University Press.
- Eden, D., & Leviatan, U. (1975). Implicit leadership theory as a determinant of the factor structure underlying supervisory behavior scales. *Journal of Applied Psychology*, 60, 736–741.
- Endrissat, N., Müller, W. R., & Meissner, J. (2005). What is the meaning of leadership? A guided tour through a Swiss-German leadership landscape. Paper presented at the Academy of Management Conference, Honululu, Hawaii.
- Epitropaki, O., & Martin, R. (2004). Implicit leadership theories in applied settings: Factor structure, generalizability, and stability over time. *Journal of Applied Psychology*, 89, 293–310.
- Felfe, J. (2005). Personality and romance of leadership. In B. Schyns & J. R. Meindl (Eds.), *Implicit leadership theories: Essays and explorations* (pp. 199–225). Greenwich, CT: Information Age Publishing.
- Felfe, J., & Petersen, L. -E. (2007). Romance of leadership and management decision making. *European Journal of Work-and Organizational Psychology*, 16, 1–24.
- Haslam, S. A., & Platow, M. J. (2001). The link between leadership and followership: How affirming social identity translates vision into action. *Personality and Social Psychology Bulletin*, 27, 1469–1479.
- Heilman, M. E. (1983). Sex bias in work settings: The lack of fit model. In B. Straw & L. Cummings (Eds.), Research in organizational behavior (Vol. 5, pp. 269–298). Greenwich, CT: JAI Press.
- Heilman, M. E. (2001). Description and prescription: How gender stereotypes prevent women's ascent up the organizational ladder. *Journal of Social Issues*, *57*, 657–674.
- Hogg, M. A. (2001). A social identity theory of leadership. *Personality and Social Psychology Review*, 5, 184–200.
- House, R. J., Hanges, P. J., Javidan, M., Dorfman, P. W., & Gupta, V. (2004). *Culture, leadership, and organizations:*

- The GLOBE study of 62 societies. Thousand Oaks, CA: Sage.
- House, R. J., Hanges, P. J., Ruiz-Quintanilla, S. A., Dorfman, P. W., Javidan, M., Dickson, M., et al. (1999). Cultural influences on leadership and organizations: Project GLOBE. In W. H. Mobley (Ed.), *Advances in global leadership* (Vol. 1, pp. 171–233). Stamford, CT: JAI Press.
- Keller, T. (1999). Images of the familiar: Individual differences and implicit leadership theories. *Leadership Quarterly*, 10, 589–607.
- Ling, W., Chia, R. C., & Fang, L. (2000). Chinese implicit leadership theory. *Journal of Applied Social Psychology*, 140, 729–739.
- Lord, R. G. (1985). An information processing approach to social perceptions, leadership and behavioral measurement in organizations. *Research in Organizational Behavior*, 7, 87–128.
- Lord, R. G., Brown, D. J., Harvey, J. L., & Hall, R. J. (2001). Contextual constraints on prototype generation and their multilevel consequences for leadership perceptions. *Leader-ship Quarterly*, 12, 311–338.
- Lord, R. G., de Vader, C. L., & Alliger, G. M. (1986). A metaanalysis of the relation between personality traits and leadership perceptions: An application of validity generalization procedures. *Journal of Applied Psychology*, 71, 402–410.
- Lord, R. G., & Emrich, C. G. (2000). Thinking outside the box by looking inside the box: Extending the cognitive revolution in leadership research. *Leadership Quarterly*, 11, 551–579.
- Lord, R. G., Foti, R. J., & de Vader, C. L. (1984). A test of leadership categorization theory: Internal structure, information processing, and leadership perceptions. *Organizational Be*havior and Human Performance, 34, 343–378.
- Meindl, J. R. (1990). On leadership: An alternative to the conventional wisdom. *Research in Organizational Behavior*, 12, 159–203.
- Meindl, J. R. (1998). Appendix: Measures and assessments for the romance of leadership approach. In F. Dansereau & F. J. Yammarino (Eds.), *Leadership: The multiple-level approaches—Part B: Contemporary and alternative* (pp. 199– 302). Stamford, CT: JAI Press.
- Meindl, J. R., Ehrlich, S. B., & Dukerich, J. M. (1985). The romance of leadership. Administrative Science Quarterly, 30, 78–102.
- Nye, J. L. (2002). The eye of the follower—Information processing effects on attribution regarding leaders of small groups. Small Group Research, 33, 337–360.
- Nye, J. L. (2005). Implicit theories and leadership perceptions in the thick of it: The effects of prototype matching, group setbacks, and group outcomes. In B. Schyns & J. R. Meindl (Eds.), *The leadership horizon series* (Vol. 3). Greenwich, CT: Information Age Publishing.
- Nye, J. L., & Forsyth, D. R. (1991). The effects of prototype-based biases on leadership appraisals: A test of leadership categorization theory. *Small Group Research*, 22, 360–375.
- Offermann, L. R., Kennedy, J. K., & Wirtz, P. W. (1994). Implicit leadership theories: Content, structure, and generalizability. *Leadership Quarterly*, *5*, 43–58.
- Rosenthal, R., & Jacobson, L. (1968). Pygmalion in the classroom: Teacher expectation and pupils' intellectual development. New York: Holt, Rinehart & Winston.

- Ross, L. (1977). The intuitive psychologist and his shortcomings:
 Distortions in the attribution process. In L. Berkowitz (Ed.),
 Advances in experimental social psychology (Vol. 10, pp. 173–220). New York: Academic Press
- Schein, V. E. (1973). The relationship between sex role stereotypes and requisite management characteristics. *Journal of Applied Psychology*, *57*, 95–100.
- Schein, V. E. (1975). Relationships between sex role stereotypes and requisite management characteristics among female managers. *Journal of Applied Psychology*, 60(3), 340–344.
- Schyns, B. (2006a). Implicit theory of leadership. In S. G. Rogelberg (Ed.), *The encyclopedia of industrial and organizational psychology*. Thousand Oaks, CA: Sage.
- Schyns, B. (2006b). The role of implicit leadership theories in the performance appraisals and promotion recommendations of leaders. *Equal Opportunities International*, 25, 188–199.
- Schyns, B., Felfe, J., & Blank, H. (in press). Is charisma hyperromanticism? Empirical evidence from new data and a metaanalysis. Applied Pschology: An International Review.
- Schyns, B., & Meindl, J. R. (2005). Implicit leadership theories: Essays and explorations. In *The leadership horizon series* (Vol. 3). Greenwich, CT: Information Age Publishing.

- Shamir, B. (1992). Attribution of influence and charisma to the leader: The Romance of Leadership revisited. *Journal of Applied Social Psychology*, 22, 386–407.
- Spencer, S., Steele, C. M., & Quinn, D. M. (1999). Stereotype threat and women's math performance. *Journal of Experimental Social Psychology*, 35, 4–28.
- Tajfel, H., & Turner, J. C. (1986). The social identity theory of intergroup behavior. In W. G. Austin (Ed.), *Psychology of intergroup relations* (pp. 7–24). Chicago: Nelsen Hall.

CROSS-REFERENCES

Century Challenges (77)

Factors Influencing Women Managers' Success (16) Career Management (61)

Diversity and Diversity Management in the Age of Globalization (64) Leadership Style: Developing a Leadership Style to Fit 21st-

Leadership in Interorganizational Networks (79)

Integrating Plurality: Toward an Integral Perspective on Leadership and Organization. (81)

The Global Manager's Work: Crossing Boundaries of Distance, Countries, and Cultures (82)

INTEGRATING PLURALITY

Toward an Integral Perspective on Leadership and Organization

WENDELIN KÜPERS

University of Hagen, Germany

Mark Edwards

University of Western Australia

his chapter provides perspectives on a more integral understanding of practice and theory of leadership and organization. Based on a critical overview of the fragmented contexts of practices and research of organization and leadership, an integral framework with specific multidimensional and interrelated spheres will be outlined. The task of this integral perspective is to bring together many of the core practical domains and theoretical positions for enacting and understanding the activities of organizing and managing. Furthermore, the integral orientation emphasizes the developmental potentials of organizations, members, leaders, and leadership in general. Finally, theoretical and methodological implications of an integral metatheorizing for leadership and organization studies and practices are discussed.

INTRODUCTION

An organization can be metaphorically construed as a great "house" where the residents share and quarrel, work together, and lead each other toward common goals. In this specific lifeworld of the organization, members are in-

volved and engaged, managing and performing their tasks and jobs, and developing social relations in various realities through many different experiences Unfortunately, organizations are also sites of dislocation, where many of their members do not feel "at home." With the rapid and unexpected workplace changes of the past decades, involving so many renovations and restorations, many have lost their sense of belonging to that house. Members of organizations often have the impression that their everyday world of work is a collection of isolated fragments, without any shared meaning or overarching coherence. This situation is mirrored in the theoretical research into organizations and their leadership. As a theoretical building, the house of organization and leadership studies might also be characterized by fragmented specialization. From a metatheoretical perspective, we can see a prevailing fragmentation that is bound to particularized ontological, epistemological, and methodological assumptions and orientations. All of this results in a kind of sectarianism, where the various schools and paradigms of leadership and organization theory live in their separate rooms and do not frequently converse with each other. The state of affairs in the lifeworlds of organization and leadership mirrors and is part of the societal context. Likewise, organization and leadership/management theory, as a general discourse, reflects and is related to major trends that have recently emerged in the social sciences.

Bringing the house "in order," and governing it in an integrative way, refers to the genuine task of "eco-nomics." Originating from the Greek for "οικος" ("oikos": house) and "v uoc" ("nomos": custom or law), hence "rules of the household," economics refers to the knowledge about appropriate "household" governance. How can we find our way in our house with its many rooms? How can we use the different rooms? How can we feel "at home" in them? How can we develop a more integrative understanding of, and practice within, the household of organization and leadership? The following does not focus on particular organizational topics, but instead reflects the generation and status of practice and theory itself as an "object." It aims to open up new possibilities for a more comprehensive framework for conceptualizing organizations and leadership. It does not claim to solve all inconclusive problems and quandaries; it proposes an integral understanding and approach for organization and leadership theory and practice. The term integral here refers to the "completeness" of a comprehensive and inclusive approach, in which the constituent "parts" and "wholes" of and within leadership and organization are not fragmented nor reduced to each other. In an integral orientation, micro-, meso-, and macrodimensions, as well as their interrelations, are brought together. Thus, briefly stated, integral means bringing together and strategically linking apparently contradictory or seemingly divergent perspectives, concepts, and practices to create a realistic, workable, and dynamic understanding and practice. Based on the groundwork of past and present contributions to organization and leadership practice and discourse, the integral approach, as proposed in the following, serves as a kind of "working philosophy." With this orientation, the fields of inquiry into organization and leadership phenomena can be explored and disclosed in a more comprehensive way. First, we present an overview of the fragmented contexts of practices and research of organization and leadership. Second, we outline an integral framework covering the multidimensional spheres involved. Third, we describe a developmental model of leaders and leadership, and of organizational members and organizations. Finally, we discuss some theoretical and methodological implications of an integral perspective for the future of leadership and organization theory and practice.

CONTEXTS OF ORGANIZATION AND LEADERSHIP PRACTICE AND THEORY

The Fragmented Status of Practices

Organizational practice refers to daily activities and a vital "household" that has many, often narrow compart-

ments and specialized rooms situated in isolation. Living in this building is currently intensified by many conflicting imperatives, dynamics, and pressures of change, making it increasingly uncomfortable as conventional practices and "comfort zones" are questioned. Over the past decade, organizations and their members have been "living in a blender of change" (Badham & Garrety, 2003). This "blender" consists of an acceleration of discontinuous change processes and transformation endeavors like downsizing, delayering, and outsourcing. This blender has its source in the many social challenges that face modern corporations. As organizations operate in more complex, competitive, and volatile environments, the need to change strategies, structures, and processes and to respond to the business challenges increases accordingly. The shifting realities of the workplace are marked by greater pressure on individuals and teams to work harder and to "deliver" more while facing greater job insecurity. As a result, many workplaces are characterized by daily stress, work-life imbalances, powerlessness, interpersonal tensions, and a severe dislocation between organizational and community life. Many managers and employees are facing contradictory performance imperatives and complex economic, social, and moral dilemmas, while at the same time experiencing increasing levels of dissatisfaction and failing to find meaning or fulfillment in their work. This results in such things as loss of motivation, burnout, inner withdrawal, hypocrisy, or even abusive practices like organizational misbehavior, organization violations, and bullying behavior. All this culminates in a permeating sense of conflict, distrust, and demotivation. Such problems impact not only on the person affected, including her well-being, but also on her relationships and on the entire organization in a dangerous, self-perpetuating cycle. Collectively, this all adds up to decreased performance, a climate of distrust, stifled innovation, and reduced creativity. The organization then becomes passive and debilitated, undermining the best intentions for change and the most carefully constructed programs for renewal. This situation is confirmed by the recent Gallup study, which found a new type of employee, the actively disengaged worker, one who is so unhappy and tuned out that they willfully undermine coworkers and employers alike (Krueger & Killham, 2005).

With regard to leadership, Kellerman (2004) has described how many practices of bad management show callous, corrupt, incompetent, or even evil sides. Hidden below the more obvious forms of leadership incompetency lies a common form of "leadership" that is simply ineffective or lacking in the skill or will to sustain effective action, unable or unwilling to adapt to ideas and new information or change, or to develop self-control in the face of ongoing challenge. Not only are there specific types of leaders who show these problematic kinds of leadership practice, but there are also followers who contribute to these problems and who must share responsibility for them. Additional specific factors such the rise of corporate scandals; the growing awareness of environmental, social, and ethical issues; and

questions about (corporate social) responsibility manifest a heightened uneasiness and a hope for another kind of organization and leadership.

Nevertheless, organizations and their members and leaders at all levels continue to create wealth, opportunity, meaning, and employment. Organizations and work are becoming increasingly important as sources of meaning in people's lives. Organizations also sustain economic networks and create goods and services that help civil society to pursue its goals in education, artistic endeavors, and scientific research. Organizations reflect societal values and aspirations and they legitimate the current systems and structures of the communities in which they function. Thus, the spiral of organizational development reflects the spiral of much broader social, national, and international arrangements. Within this social complex diversity and within the context of these positive and negative aspects of organizations and their leaders, organizational and leadership theorists have attempted to develop their understandings and explanations.

The Fragmented Status of Theory and Research

The challenges facing organizations and leaders are mirrored in the fragmented scientific context of economic, organizational, and managerial theories. The plethora of organizational and leadership theories are based on such diverse premises, seemingly unconnected assumptions, and contrasting worldviews that it is difficult to see how they might ever be seen as related or as contributing to each other in some way. It is not the diversity of plurality of views that is the problem here, but the lack of connection between them—the absence of metatheoretical positions that might bring some sense of relationship between such diverse theoretical perspectives. The disjoint in theory and research not only limits communication and collaboration, but also constrains the ways we deal with current and future challenges.

As organization theory and discourse emerged from within the fields of sociology and engineering, it absorbed a mechanistic and functionalistic paradigm that has shaped its canon to this day. Organizations are conceptualized as instruments for reducing uncertainty. They are assessed according to objective, performance-based criteria on how they achieve specific predetermined, market-driven goals. These goals are set and governed through instrumental and technical rationality and a type of organizational thinking that follows a quantifying, means-ends variety of formal logic. Such worldviews often inadvertently result in shortsighted policies that neglect important longer term opportunities and issues. Furthermore, much of the prevailing economic and business research adopts a reductionist approach that does not recognize the interrelatedness of individual, interpersonal, sociocultural, and environmental phenomena. These shortcomings find their correspondences in the leadership discourse. The scientific study of leadership has contributed significantly to the understandings and explanations of these fields. Academic scholarship has also provided innovative and evidence-based intervention strategies for attaining the conventional organizational goals of increased efficiencies and effectiveness through improving all manner of organizational systems and management practices. However, it is also clear that management schools and theories they espouse and apply in their research and teaching—are unable to meet the challenges facing contemporary leaders and their organizations. In his paper titled "Bad Management Theories Are Destroying Good Management Practices," Ghoshal (2005) proposed, "Many of the worst excesses of recent management practices have their roots in a set of ideas that have emerged from business school academics over the last 30 years" (p. 76). Prevailing leadership approaches are bound to fragmented or mutually exclusive paradigm parameters, and they lack an inclusive orientation toward leadership. This results in an incomplete approach of leadership phenomena and can lead to inappropriate investigations, simplistic understandings, invalid conclusions, and managerialistic implications, which have been criticized. Fragmented and trivial leadership concepts and "research" are often informed by superficial ideas of management and the latest prepackaged list of "essential" qualities deemed necessary for solving all leadership dilemmas. To avoid such simplistic and reductionistic perspectives, leadership studies require more expansive conceptual openings and discourses. Leadership literature is currently characterized by competing approaches that emphasize different aspects of leadership. Each of these positions has both insights and shortcomings. Space constraints preclude a comprehensive review of these approaches here; however, the following discussion illustrates some of the main limitations of traditional leadership approaches. The more conventional approaches take a person-centered, dyadic perspective and follow a "heroic leadership" conceptualization. This understanding sees influence as unidirectional, flowing from the individual leader to the individual follower, and represents an entitative, egocentric, and monological view. In conventional leadership-centered frames, leaders are positioned as knowing and structuring, and followers are positioned as subordinates of these processes. Consequently, little attention is paid to followers despite their coconstitutive role in, and interdependence with, the leadership process. Moreover, leadership has not typically been considered as a collective phenomenon, and there has been a neglect of forms of group-level and organizational leadership, whereas, in fact, leadership is an inherently communal capacity and achievement. Recognizing that most people have, or may develop, roles as both a leader and a follower in the same organization becomes especially relevant for the increasing number of organizations using self-managed teams, executive teams, flexible structures, partnering, and joint ventures. Furthermore, both organizational and leadership discourse tend to underestimate human development issues—particularly those concerning the embodied and emotional dimensions—while privileging a disembodied rationality and cognitive approaches.

314 • LEADERSHIP WITHOUT BOUNDARIES

The impact of these underlying presumptions can be seen in the empirical focus on ratings of individual abilities, traits, characteristics, and behaviors via cause-effect relations and purely cognitive variables. These types of data reflect limited theoretical views that are inadequate for studying organizations and leadership as a dynamic processes embedded in turbulent and complex social and institutional environments.

The foregoing has identified some serious social challenges and theoretical shortcomings in the current state of organization and leadership theory and research. This calls for a more integral approach that will enable a more inclusive position for investigating and enacting the interrelated processes of leading and organizing.

AN INTEGRAL FRAMEWORK FOR LEADERSHIP AND ORGANIZATIONS

One of the most important capacities for any metatheoretical framework is to be able to provide nonreductive understandings and explanations. The integral approach draws on the "holon" construct to achieve this holistic/analytical capability. Although they can be used to represent entities, processes, and events, holons are essentially abstract ways of representing integrative part/whole relationships (Koestler, 1967). They can be used to accommodate divergent and often opposing understandings within a single conceptual framework. Holons can be seen as possessing structure *and*

as subject to processes that are simultaneously autonomous and dependent, characterized by differentiation and integration. For example, organizational change has been understood and researched in terms of individual agency, collective structure, and as combinations of both views. The holon construct can accommodate these varying conceptualizations within a nonreductive framework (Edwards, 2005). A holonic understanding brings together and utilizes the many different theoretical lenses that have been developed for understanding organizational and leadership phenomena. These lenses are the domain assumptions that theories within particular paradigms use to understand, explain, and research their "data." Two very important and commonly applied lenses are the interior-exterior dimension, which considers subjective and objective worlds, and the individual-collective dimension. These two lenses can be juxtaposed to form a framework for connecting not only relevant practical domains, but also all those theories and paradigms that adopt some explanatory position using these dimensions (see Wilber, 1999–2000). The holon construct allows for the creation of complex models that have the conceptual power to accommodate many different practical and theoretical orientations for describing social relationships and behaviors.

On one hand, a great deal of the work of organizational members and managers involves managing and dealing with the dynamics between individual parts and collective wholes. On the other hand, "part" (the constitutive elements) and "whole" (the entire system) in organization and leadership are not separate, static structures, but actively coconstitute each other—that is, they are primarily enfolded and entangled. For example, leader(ship) is a holonic part of follower(ship), and vice versa: followership is integral of leadership. Therefore, both are interrelated phenomena best described as a holarchical process, which is a more accurate and comprehensive conception (Küpers, 2007). Figure 81.1 shows the moment-by-moment "occasions of practice" that constitute individual and collective leadership.

As already mentioned, one of the most important lens combinations for exploring organizations and leadership is produced by bringing together the two dimensions of interior-exterior and individual-collective. The four resulting quadrants representing four fundamental aspects of any "occasion" (Wilber, 2006). These are (a) the interior of the individual, or the consciousness quadrant; (b) the exterior of the individual, or the behavioral quadrant; (c) the interior of the collective, or the cultural quadrant; and (d) the exterior of the collective, or the social quadrant. Because

Individual (leadership) Behavioral Consciousness Quadrant (UL) Quadrant (UR) Individual Holon Interior Exterior An Occasion lifeworlds lifeworlds of Practice Collective Holon Cultural Social System Quadrant (LL) Quadrant (LR) Collective (leadership)

Figure 81.1 Organization and Leadership as Holonic Occasions

their importance to integral analyses, these quadrants will be described in depth as they apply to leadership in organizational studies.

QUADRANTS AS SPHERES OF LEADERSHIP AND ORGANIZATION

The Consciousness Quadrant

This quadrant represents the interior individual aspects of organizational members. It involves the intrapersonal or subjective experiences of persons and their attitudes, intentions, meanings, unconsciousness feelings, cognition, volition, motivation, knowing, and memory. Importantly for the business context, it refers also to the readiness for motivation and commitment to self, to a goal, or to an organization. This inner world has specific relevance for leadership. For example, a longitudinal study carried out by Torbert and his colleagues (2004) showed that the success of organizational transformation efforts was dependent upon the level of consciousness of leadership. However, leadership development and practice are most effective when the individual interior dimensions are linked and supported by external action and tangibles. In this quadrant, the focus is on helping organizational leaders see what their leadership style might be so that they acquire more insight into themselves and their impact on others. It also deals with the psychological dimensions of an individual leader and how these impact on the organization and its development. Methodologically, this inner world of each individual requires disciplines like introspection, phenomenology to be uncovered. Practically, it is only accessible through using self-reporting techniques or profound dialogues with a person; access to her private writing, speeches, or other productions; or through interviews with her and her close associates.

The Behavioral Quadrant

The behavioral quadrant treats the external aspects of individual members and leaders, referring to all objective and behavioral activities. This is the performance domain of individual skills, competencies, and all those embodied actions of behavior that can be measured and refined. Training and development opportunities that support the development and enactment of competencies and peak performance are part of this quadrant, as well as coaching, communication, goal setting, and skills that develop effective practice. The role of leadership in this realm of performance management requires the management and monitoring of specific tasks, competencies, and actions to achieve the goals of the organization. In this capacity, the leader functionally manages material and substantive resources, human resources, and checks if goals are being met and tasks carried out. In terms of *method*, this quadrant is the domain of empirical

observation and quantitative measurement. The methods of behavioral sciences are employed hereto measure and assess leadership performance via such methods as individual performance appraisals.

The Cultural Quadrant

The cultural quadrant deals with the intersubjective space of mutual recognition and internal collective aspects of organization and leadership. The intersubjective world of shared history, myths, stories, and values are all part of this quadrant. It is also the domain of unwritten beliefs, shared meanings, and worldviews; and it also includes taboos and informal customs that can be discerned from how people justify and explain what they think and do together. This domain considers the deeper significance of collective rituals, ceremonies and symbols, sociocultural purposes, and visions. Crucial ingredients for sustainable organizational success, such as collective morality and meaning making, are located here. This quadrant is characterized by a common language and signs that can be understood, communicated and shared with others. The focus here is on groups or teams as a collective of individuals, who are interdependent and interact on a face-to-face or virtual basis with one another. Leadership exerts various influences upon this aspect of organizational life and the social lifeworld of structure and roles also codetermine cultural identity. However, a leader cannot manipulate this sphere directly, because it is, to a large extent, determined and controlled by the collective cultural identity of the organization and its social environment. As a form of "people management," leadership here requires coaching and working with employees to cultivate teamwork and communication. Furthermore, leadership here may take new collective forms such as those of shared or distributed team leadership. The personal modeling of values and integrity and their ongoing iteration from leader to follower(s) is also an important element here.

The methods used to disclose "data" in the cultural quadrant are interpretative approaches like hermeneutics (the art and science of interpretation), interpersonal dialogue, collaborative enquiry, action research, and certain forms of anthropology, each of which focuses on some aspect or other of the human intersubjective realm. Corresponding interview techniques—like depth and narrative interviewing—serve to disclose multiple voices about collective meaning making.

The Social/System Quadrant

The social quadrant covers those aspects of organization and leadership that are collective and exterior, those aspects that are observable and shaped by the structural patterns of social reality. This is the world of organizational structures and systems of all kinds—managerial, financial, technological, and informational. It is also the face of

the organization that is seen in job roles, procedures, and workplace practices. This aspect of organizational life is amenable to study by systems theorists and is often represented as quantities and qualities of inputs, throughputs, and outputs. In other words, this is where thinking about the organization as a performance system is important. The leadership-related focus of this area is on issues such as how to redesign or reengineer the organizational system so that it performs at higher levels. For this purpose, it covers managerial functions, such as the structuring of management and organizational processes, financial strategies, organizing means of production, techniques of marketing, information, and communication technologies. This domain involves the organizations' relationships with the external world of markets and stakeholders. It includes relations and negotiations with industrial stakeholders to obtain resources and factors relevant for the organization. This includes keeping in contact with customers and ensuring that the services and products are meeting their needs. As this realm refers to the concrete collective world of that which is tangible, measurable, and quantifiable, it can be studied with objective research methods. The "new science" approaches of chaos, complexity, and system theories are relevant here. As the social system quadrant concerns the objective features and operational domain of the exterior world, fields such as structural functionalism and the ecological sciences, among others, provide methodological approaches for investigating this field. From this perspective, leadership and organizations here are more likely to be thought of as transforming systems in various states of dynamic (dia)equilibrium than as rigid forms of social "inertia." As such, they are characterized by irreversible, progressive contexts within an emerging order. This implies that chaos and complexity are not problems to be solved, but the engines of evolution, adaptation, and renewal in organizations.

INTERRELATING SPHERES AND THEORIES OF ORGANIZATIONAL AND LEADERSHIP PRACTICE AND STUDIES

Each of the four quadrants depends on the others for its basic existence and sustenance. Integral theorist Ken Wilber (1999–2000) says that the quadrants "tetra-interact and tetraevolve"—and an integral approach is sensitive to those richly textured patterns of "infinite interaction." What is therefore needed is an approach that considers all quadrants, to show that organizational and leadership practices and developments are carried and played out within and between all these four domains. Thus, an integral approach explores the embeddedness of these various spheres within and between one another and the degree to which the levels mutually influence or constrain each other. Figure 81.2 shows the different spheres of integral leadership and organization, where the horizontal axis presents a continuum between "interior" and "exterior" realities and the vertical axis a continuum between "individual" and "collective" realities.

In our view, the question of what constitutes effective and sustainable organization and leadership practice and theory requires giving answers from different perspectives, compromising all of the domains and all the conceptual lenses that can be assembled within the integral framework. Various research traditions and developments of organization and leadership studies have made tremendous contributions to each of these different domains; however, each has limitations, particularly in terms of modeling, assessing, and developing of an integral comprehension. Due to its specialization and shortcomings, conventional approaches tend to perceive issues of organization and leadership from selective fields only. They often focus on a particular feature or causal process, and then either implicitly or explicitly assert that this is the main or only causal factor. In a way, each approach is "true," but only partially. The task will be to figure out how to fit these partial truths together and how to integrate them inclusively, not how to pick one and get rid of the others. The exterior and objective perspectives on individual and collective behavior have become the prevailing canon in dominant functionalist approaches in organization and leadership studies. However, to understand organization and leadership as a holonic "four-quadrant affair" requires us to embrace the interior dimensions as well, including their inner meanings. Conversely, the oftenneglected inner lives of organizational members and leaders and the collective spheres of leadership must also be seen as equimordially relevant and codetermined by behavioral and exterior dimensions. To privilege one quadrant over another is to disturb the delicate integration, coevolutionary relationality, and interconnectedness of effective organizational and leadership practice and theory. Recognizing the underlying principle of fundamental interconnectedness, an integral approach recognizes that pathologies in any quadrant will reverberate through all the others. From an integral perspective, all dimensions of organization and leadership cocreate each other and unfold and develop holonically. Thus, specific dimensions of organization and leadership are not narrowly located in one quadrant, but need to be studied from the perspective of each quadrant, as well as from their complex interrelations. Therefore, the different spheres between the individual and collective and subjective and objective identities need to be seen as an interwoven nexus as shown in the following figure.

An integral approach aids the exploration and facilitation of an understanding that is more in tune with the diversity and ambiguity of organizational life and with the corresponding intricacies of leadership practices. By applying varied lenses and perspectives, integral researchers are more adequately equipped to shed light on tensions that come along with organizational and leadership practices, e.g., by exposing conflicting demands as complementary, and by demonstrating that apparently opposing interests are actually interwoven in a process. But an integral conception is not a "harmony" model, as it does consider relations, disparities, and conflict. Although the framework can generate quite a degree of complexity (especially when

other important conceptual lenses are combined with the quadrants framework), this does not exclude specific focus and investigation of particularities, for example, of disharmonious and conflict-shaped realities. To take an example, an integral understanding of influence and power in organization and leadership would include, for instance, a phenomenological analysis of this dimension on the subjective meaning and projections of individuals (Consciousness Quadrant) and empirical observations and measurement of the enactments of the individuals' behaviors (Behavioral Ouadrant), an interpretative ethnographic investigation of power within organizational culture (Culture Quadrant), and the functional and structural aspects or power as it appears in institutionalized forms within social systems (Social System Quadrant). The interrelationship among these different quadrants would reveal the interwoven complexities of influence and power processes. The same quadrant-specific and interrelational investigations could be applied to various other organization leadership- and followership-related phenomena. Additionally, using an integral inquiry of this type can diagnose various problems, pathologies, and conflicts, as well as provide ways for dealing with them.

As organizations make the transition to meet today's challenges, they must consider which aspects of organizational members' consciousness, their action, and the organization's culture and social system are being impacted in order to set priorities and enact practices. With this an "all-quadrant" approach is an essential presupposition for effective organizational and leadership-related practice. Organizations and leadership that embark on comprehensive and sustainable change and development must address each quadrant and the holonic interrelation within and between them. Actual experience and practice always encompass not only all four quadrants as basic lenses that frame perception

Interiors

Consciousness
Quadrant

Integral Leadership
and Organisation

Culture
Quadrant

Collective

Collective

Figure 81.2 Interrelations Within Framework of Integral Leadership and Organization

along certain perspectives, but also its evolutionary potentials as expressed in the integral lenses of developmental stages and lines. These dynamic processes—as outlined in the following—refer to two more important conceptual lenses that build on the quadrant framework for organization and leadership that we have focused on to this point.

DEVELOPMENTAL STAGES AND LINES OF LEADERS AND LEADERSHIP WITHIN AN INTEGRAL CYCLE

All four quadrants show growth, development, or evolution. That is, they all can be seen as transforming through various stages or levels of development, not as rigid rungs in a ladder, but as fluid and flowing waves of unfolding. Thus, the quadrant framework can be dynamically extended by a series of different developmental stages or levels of development of organizational members and organizations. Each stage represents a level of organization or a level of complexity. The word "level" is not meant in a rigid or exclusionary fashion, but simply to indicate that there are important emergent qualities that tend to come into being in a discrete fashion, and these developmental levels are important aspects of many natural phenomena. The levels of development refer to what is being developed (matter, body, mind, soul, and "spirit") as generalized "waves" of existence. Thus, the levels are stages of development through which human beings proceed by transcendence and inclusion. The levels mark out new capacities and emergent qualities through the lives of organizational members and leaders situated in their specific context. Furthermore, these basic levels, though unfolding at different rates, can be seen as fluid, flowing, overlapping waves in an overall spectrum

of transformation.

Developmental studies within psychology and sociology have focused on several developmental dimensions as basic components of individual and collective human functioning and overall growth. These different dimensions are what Wilber (2005) refers to as "developmental lines or streams." These developmental lines reflect innate capacities and functions within the stages. As such, they codetermine a human being's capacity to perform successfully in various circumstances. The developmental lines concern complex developments, such as cognitive (e.g., strategic thinking), emotional (e.g., emotional intelligence), interpersonal (e.g., social awareness, empathy), behavioral (e.g., managerial acting), knowledge, and learning developments, or ethical/moral lines of organizational members and their processes. Most of these lines develop in a relatively independent fashion at their own rate with their own dynamics. Some lines are necessary but are not sufficient for others, while some develop closely together (Wilber, 1999–2000).

Collectives such as organizations can be regarded as developing through these multidimensional capacities (Cacioppe & Edwards, 2005). For organizations, these can include lines of education, medicine, technology, leadership, politics, governance, religion and spirituality, public morality and ethics, economics, international relations, law and legal process, media, and entertainment. All of these areas of social activity are subject to developmental growth in that they can be regarded as moving through regular patterns of systematic change. Edwards (2005) made the point that "as with individuals, the healthy organization will develop in a balanced way across a number of key lines" (p. 282). For example, an organization whose ethical line of development was severely out of step with its financial systems would evidence considerable problems across many important facets of its operations and culture.

As capacities increase in a developmental line, it moves to a more integrative stage in the overall spectrum. Accordingly, the lines develop over time through increasingly complex levels of maturity, education, and skill. But this is a very idiosyncratic process, and no two individuals or groups navigate their way through these developmental complexities in the same way. There are also "lagging lines" of development that represent specific weaknesses. These underdeveloped capacities may be a limiting factor for both leaders and organizations, and they may impact significantly on their overall behavioral effectiveness, state of well-being, cultural balance, and social functioning. Under-

standing the concepts of levels and lines of development can be beneficial for leaders in their own development, as well as for influencing and motivating followers. Comparing stage-based theories across different developmental lines shows that there is a tendency for individuals and groups to move from egocentric views (e.g., trait models), through ethnocentric views (e.g., group dynamics models), and to world-centric views (e.g., transformational or servant leadership model, organizational wisdom). An integral organization and leadership theory acknowledges that organizational agents, leaders, and followers as complex beings who mature and develop over time in relationship to physical, emotional, cognitive, social, and spiritual lines, and who recognize that they have desired transcendence-related work accomplishments progressing through the stages of human development. Unpacking the significance of "levels and lines" simply means that a leader, a follower, or a group

or organizational system can be at a fairly high level of development in some lines (e.g., cognitive), at a medium level of development in other lines (e.g., interpersonal), and at a fairly low level in yet others (e.g., moral). This makes intuitive sense, as we all know persons or groups who are advanced in some skills (e.g., they are highly intelligent), but not as developed in other capabilities or competencies (e.g., they are less empathetic or ethical). As characterizations of organization and leadership capacities, the lines of development also influence how well members (e.g., leaders, followers, groups) and entire organizations perform. These developmental lines can therefore be measured using "levels of proficiency." For example, a leader may possess a high "level" of proficiency in cognitive ability (e.g., high IO) but may have a low level of proficiency at interpersonal skills (e.g., low EQ). With this there is the need to assess and identify levels of proficiency on each major line of development of leaders and of their followers. Having some understanding about the multimodal nature of human development can help leaders to be better informed about delegating, supporting, and coaching individual staff and teams in regard to their specific configurations of capacities, or to determine the need for training to strengthen proficiency on selected lines. In turn, these understandings may support the self-development and self-understanding of others. Furthermore, the levels, lines, and quadrants are energized by the dynamics of growth and integration within an "Integral Cycle" (Edwards, 2005), which keeps all of these elements hanging together in a coherent and dynamic system and coordinates the interaction between the four quadrants and the holonic developmental levels and lines.



Figure 81.3 The Integral Cycle of Leadership and Organization

With its capacity to analyze, categorize, and synthesize, the concept of an integral cycle is a way of representing the mutual interpenetration of the quadrants. Furthermore, it covers their constituent structures and the integrative and growth dynamic relationship that exists between the domains and its involutionary and evolutionary pathways.

Each of the holons develops simultaneously through all four quadrants, coevolving in an intimate cycle of mutual interpenetration. To understand how these spheres are dynamically and "holonomically" interrelated, we would need to follow a processual turn. While such a task is beyond the scope of this chapter, the issues of relationality and process need to be seen as core aspects of an integral approach to organizational and leadership studies.

THEORETICAL CONSIDERATIONS AND METHODOLOGICAL IMPLICATIONS

As mentioned before, innovative metatheoretical positions need to be developed and described, which can build conceptual bridges between the plurality of constructs and models that characterize contemporary organization and leadership research. There are two general alternatives that have been put forward for dealing with the challenge of theoretical plurality. The modernist position is one that works toward unity and synthesis and it seeks a single consensus model based on empirical evidence and rational criteria for evaluating theory. The postmodernists' position is one that supports this diversity and sees this state of affairs is healthy, desirable, and to be encouraged. Both of these alternatives have their merits and disadvantages, their potentials and limitations. Ultimately, however, these approaches end in either a dogmatic positivistic purism, where specialization reigns within a dominant theoretical paradigm, or an unbounded relativistic pluralism, where fragmented diversity holds sway. How to avoid the specialization trap and the fragmentation trap? In metaphorical terms, what is needed is a third alternative that is neither a sterile, overtended, monocultural garden, nor a scruffy weed patch where anything grows. We need grounded conceptual frameworks that elicit from organizational and leadership theory their complementarities and correspondences. We need a shift toward innovative paradigms that can transcend paradigm incommensurability and/or reductionistic narrowness. Such a shift requires juxtaposing and connecting partial understandings and representations so that various multiparadigm research combinations and integral connections can emerge.

As we have seen, integral methods for investigating theories of organization and leadership are multifaceted in that they utilize multiparadigm and metatheoretical research designs. Multiparadigm because they review and analyze extant leadership and organizational theory of all kinds, and metatheoretical because they build on that analysis to propose overarching frameworks that recognize the

plurality of theoretical views. One important conceptual lens for multiparadigm review and metatheory building is the personal perspective. Integral methods for investigating leaders and organizations are pluralistic in that they can inquire into first-person subjective aspects, second-person relational aspects, and third-person objective aspects of these areas. Each of these perspectives (singular and plural forms) carries with it inherent methodologies or modes of inquiry. They can all help to inform the way research seeks out different approaches for understanding the complex dimensions of organization as well as leadership and its followership connection (Küpers, in press-a). The first-person world of subjectivity includes the qualitative and experiential dimensions of life. First-person methods inquire into subjective awareness and the meaning of personal experience and action. Leadership theory here is concerned with the emotional, phenomenal experience and the existential realities of being in a position of leadership. First-person research methods such as autobiographical methods and journaling are becoming increasingly important in the academic study of leadership. The popularization of autobiographies in particular has contributed much to our understanding of how leaders experience their roles and how they cope with, and succumb to, the complexities and challenges that they meet on a daily basis. The second-person world of relationships includes all those interpersonal and groupbased experiences that comprise so much of the day-to-day pragmatics of leadership. The capacity to communicate, inspire, and model integrity on the interpersonal and team levels are hallmarks of authentic forms of leadership. Relational methods such as 360 evaluation techniques, group process, personal and unstructured interview techniques, and peer-group feedback provide a window into the secondperson world of relationality and a means for disclosing the multiple voices individual and collective sensemaking. The third-person world of objective methods focuses on the empirical, behavioral and outcomes-based methods of quantitative analysis leadership and organizational reality. Here, the emphasis is on the behavioral investigation of leadership through such means as psychometrics, situational analysis, and detailed observation. Third-person methods can be used for investigating quantitative data with rigor. An integral methodology recognizes the validity of behavioral, functionalist, and reductive analyses and quantitative investigations.

In turn, each of these first-, second-, and third-person methods can be combined with other paradigm lenses to develop overarching frameworks. For example, they can be combined with multiple levels of organizational structure to investigate relationality at the micro level of individual leadership roles, at the meso level of leadership within teams and committees and at the macro level of organizational leadership. These kinds of multiparadigm approaches are examples of what Ken Wilber (2006, p. 33) has called "Integral Methodological Pluralism" (IMP). It represents a metaparadigm that weaves together its many threads into an

integral tapestry, a unity-in-diversity that slights neither the unity nor the diversity. An IMP provides a comprehensive framework for identifying methodologies for investigating basic "lifeworlds" that together form a comprehensive methodological framework for studying leadership and organizational life. Organization and leadership researchers, therefore, need to engage with ideas and standpoints from different inquiry paradigms that are characterized by different assumptions about actors and relations. The challenge will be to link the various elements of the spheres that have been so far separately addressed within an explicitly integrative context, for this integral theory does not assume that paradigms are incommensurable. Even if the underlying paradigms are based on a set of apparently opposing metatheoretical assumptions, an integral metaparadigm can accommodate conflicting knowledges and disparities. Using second-order constructs, integral metatheorizing provides a reference system for linking disparate representations (Gioia & Pitre, 1990). This position is in contrast to Burrell and Morgan (1979), who have advocated "paradigmatic closure" and "isolationism" between paradigms that they see as "mutually exclusive views of the social world." In contrast, an integral perspective of holonic complementarities questions this assumed incommensurability and supports research strategies that transcend the incommensurability argument.

Multiparadigm methods of researching leadership and organizations require a close familiarity with the core characteristics of major theories in these fields. Such immersion and constant reexamining and questioning of foundational assumptions of various theories and practices enables experiential learning that further elevates "paradigm consciousness." This in turn protects self-reflective researchers from becoming trapped within a peripheral vision or limited range of conceptual possibilities and to understand leadership theory from a more integral perspective. An integral paradigm imbeds and does not merely synthesize other paradigms and theories into some artificial unity. By accommodating various theories, methodologies, and insights holonically, they can find their place in a broader, integrative scheme. For example, the presence of the interior-exterior dialectic in the structure of a holon provides an opportunity for disclosing and integrating subjective, interpretive data, as well as objective, behavioral data in understanding organization and leadership. Additionally, with its multi- and metaparadigm capacity, the integral framework encourages greater awareness of theoretical and methodological alternatives. Thereby, it facilitates discourse and/or inquiry across paradigms ("paradigm interplay"), fostering greater understanding within pluralist and even paradoxical organizational and leadership contexts (Lewis & Kelemen, 2002).

In applying a multiparadigm and metatheoretical framework, integral researchers may develop multisided accounts that depict the diversity and complexity of organizational life. Even though integral theorists cannot shed their predispositions, they can contrast or relate their preferred representations to those of other paradigms. With this capacity, an integral perspective strives for an expanded range, allowing alternatives to coexist and engage in potentially more insightful and creative orientations and interactions. Being critically self-reflective, integral theorists learn to view and depict paradigms as detailing different layers of meanings, which also facilitates a more reflexive exploration of leadership and organizational practice. Methodologically, to grow into a more multi- and interdisciplinary endeavor, future organization and leadership research needs to break its largely univocal narrative and open up to multiple and innovative methods. Bringing these perspectives together highlights the different possibilities that exist for investigating how they might interrelate for a better understanding of organization and leadership. Furthermore, the outlined premises and arguments make it possible to view organization and leadership research as a process of social construction and practice itself, and to view this research as part of the investigated and narrated relational process. Hence, the research process can be interpreted as a way of going on in relationship, constructing knowledge and social validation. To facilitate heterachical ways of relating, the research methodology of participatory action research and the deployment of further qualitative and interpretive research strategies, with a strong "situational" and case study focus, seem particularly suitable. Moreover, from an integral perspective, quantitative and qualitative research can be mutually informative and illuminating in the study of organization and leadership. In a similar way to multiparadigm inquiry (Lewis & Grimes, 1999), an integral orientation may help theorists to gain an appreciation of new fields of knowledge and reduce their commitment to a favored and "provincial" point of view. An integral approach facilitates a shift from parochialism toward a more rich, contextualized, and multidimensional theory (building), offering a greater explanatory potential. For this, the complex framework needs of course to be methodologically operationalized in detail, in terms of determining constructs and variables setting and testing hypotheses, antecedents, moderators, mediators, outcomes, and their interrelations. Furthermore, considering the developmental levels of organizational members allows a more dynamic understanding of the processes involved. Exploring organization and leadership as a processual event implies a methodological focus on relations, connections, dependences, and reciprocities, investigating specific encounters, and relational issues or situations. Integral methods not only provide the possibility of a shared language for addressing the basic patterns and problems of organizational and leadership practices, they can also be used as a functional guideline that is careful not to reduce, oversimplify, isolate, or fragment our understanding of organization and leadership. By offering multidimensional perspectives and developmental orientations, integral frameworks can illuminate our blind spots, revive our otherwise reductionistic pictures of reality, and challenge our limiting assumptions about the nature of leadership and organizational systems.

PERSPECTIVES AND CONCLUSION

This article has argued that an integral framework enables a more inclusive approach to the understanding and study of organization and leadership. An integral framework provides the base for a substantial theoretical advancement of the general discourse around these topics. However, researching and theorizing about organizations and leaders from an integral perspective means that corresponding practice and development is more complex and difficult to design and implement. To realize such an extended understanding and a corresponding sustainable practice of an integral organization and leadership requires an even deeper comprehension of the role of personal, interpersonal, sociocultural, and systemic interrelations. While such demands are not unreasonable, they do put up considerable barriers to the ready appreciation of integral approaches. Because we are in the early stages of moving into an integral approach to the study of organization and leadership, there are many open questions and fields of applications to be explored. Further detailed mapping is required for moving through the conceptual landscape of an integral understanding. There is the need to examine the contingency between the interior dimensions of individuals (leaders and followers) and their external tasks and actions, as well as the relation to collective spheres. Further research will need to investigate ways in which diversely situated individuals and their behavior, as well as groups in various interrelational arrangements and systemic organizational settings, constitute experience, and enact, and process practices. Conversely, influencing conditions and factors of both sociocultural and systemic spheres-for example, relation between individuals or groups to formal organizations and the "space in-between" (Bradbury & Lichtenstein, 2000)—need to be thoroughly investigated. It would also be worthwhile to investigate the effect that power relations, sociopolitical tensions, and conflicts have on the connections between inner processes (e.g., feelings or emotional dissonances) and their external enactment at both individual and collective levels of leadership. Research could also examine how the interaction between individual and organizational priorities affects the character and development of various experiences and processes. These may also include communicational, improvisational, and aesthetic dimensions or ethical issues present in interrelated organization and leadership practices. The conceptual integrated framework as proposed here can support research along those avenues. Thus, the outlined concept of integral leadership provides only a "bedrock" for more rigorous theory building, further analysis, and empirical testing. As the new era of organization and leadership research tends and evolves more and more into one of converging evidence and integration, the challenge will be to synthesize accumulated knowledge and develop further knowledge in such a way that we can begin to construct hybrid and interdisciplinary theories of organization and leadership covering diverse perspectives. With this, researchers, and also organizational members, can not

only categorize and connect existing concepts, but can also use the diagnostic, prognostic, and interpretative qualities and evaluative potential of an integral approach. Integral approaches are likely to serve as a helpful antidote to shortterm, fragmented, and one-sided orientations. Even more, employing the proposed framework in an emerging integral theory and its corresponding practice will provide a base on which to build a more sustainable and rewarding lifeworld of organizations. In other words, effective and successful organizational members and leadership processes of the 21st century will be those that understand, foster, and help create and enact a more integral way of organizing, leading, and following. Moreover, an integral organization and an integral leadership will be one which realizes practical wisdom (Küpers, in press-b). Such a "wise" organization looks to developing its staff, its teams, its culture, and its social systems toward more embracing forms of well-being. Forms that contribute to enhancing the leadership potential of all its members and the well-being and sustainability of the communities and stakeholder in which it operates. In addition to such contributions, the outlined integral framework offers challenges for developing a more comprehensive and adequate research methodology that can honor the many different theories and corresponding practices of the complex nexus of organization and leadership. In this way, we might be able to find our way around the bewildering complexities of organization and leadership practices and studies, and also rebuild and shape these lifeworlds in a more adequate way, fulfilling the task of genuine "economia" as the art of appropriate "housekeeping."

REFERENCES AND FURTHER READINGS

- Badham, R., & Garrety, K. (2003). In the blender of change: The carnival of control in a culture of culture. *Tamara: Journal of Critical Postmodern Organization Science*, 2(4), 22–38.
- Bradbury, H., & Lichtenstein, B. M. B. (2000). Relationality in organizational research: Exploring the space between. *Organization Science*, 11, 551–564.
- Burrell, G., & Morgan, G. (1979). *Sociological paradigms and organizational analysis*. Portsmouth, NH: Heinemann.
- Cacioppe, R., & Edwards, M. G. (2005). Adjusting blurred visions: A typology of integral approaches to organizations. *Journal of Organizational Change Management*, 18(3), 230–246.
- Edwards, M. (2005). The integral holon: A holonomic approach to organisational change and transformation *Journal of Organizational Change Management*, *18*(3), 269–288.
- Ghoshal, S. (2005). Bad management theories are destroying good management practices. *Academy of Management Learning and Education*, 4(1), 75–91.
- Gioia, D. A., & Pitre, E. (1990). Multiparadigm perspectives on theory building. Academy of Management Review, 15, 584–602.
- Kellerman, B. (2004). *Bad leadership: What it is, how it happens, why it matters*. Boston: Harvard Business School Press.
- Koestler, A. (1967). *The ghost in the machine*. London: Arkana. Krueger, J., & Killham, E. (2005, December 8). At work, feeling good matters. *Gallup Management Journal Online*, 1–5.

- Küpers, W. (2005, September). Phenomenology and integral pheno-practice of embodied well-be(com)ing in organizations. *Culture and Organization*, 11(3), 221–231.
- Küpers, W. (2007). Perspectives on integrating leadership and followership. *International Journal of Leadership Studies*, 2(3), 194–221.
- Küpers, W. (2007). Integral pheno-practice of wisdom of management and organisation. *Social Epistemology*, 21(2/3), 169–193.
- Landrum, N. E., & Gardner, C. L. (2005). Using integral theory to effect strategic change *Journal of Organizational Change Management*, 18(3), 247–258.
- Lewis, M. W., & Grimes, A. J. (1999). Metatriangulation: Building theory from multiple paradigms. *The Academy of Management Review*, 24(4), 672–690.
- Lewis, M. W., & Kelemen, M. (2002). Multiparadigm inquiry: Exploring organizational pluralism and paradox. *Human Relations*, 55(2), 251–275.
- Paulson, D. S. (2003). Competitive business, caring business: An integral business perspective for the 21st century. New York, Paradigm Books.
- Torbert, W., & Associates. (2004). Action inquiry. The secret of timely and transforming action. San Francisco: Berrett-Koehler.

- Wilber, K. (1999). *Collected works of Ken Wilber*: Volumes 1–4. Boston: Shambhala.
- Wilber, K. (1999–2000). *Collected works of Ken Wilber*: Volumes 1–8. Boston: Shambhala.
- Wilber, K. (2005). Introduction to integral theory and practice: IOS basic and the AQAL map. *AQAL: Journal of Integral Theory and Practice*, *I*(1), 1–32.
- Wilber, K. (2006). *Integral spirituality*. Boston: Shambhala. Yukl, G. A. (2006). *Leadership in organizations*. Englewood Cliffs, NJ: Prentice Hall.

CROSS-REFERENCES

Networks (74)

Toward Sustainable Organizations for the 21st Century (25) Holistic Approaches to Business Planning (36) Organizational Politics in Management Settings (71) Understanding and Managing Misbehavior in Organizations (72) New Approaches for Cultivating and Nourishing Communications

Leadership Style: Developing a Leadership Style to Fit 21st-Century Challenges (77)

Organization Development in the 21st Century (92)

THE GLOBAL MANAGER'S WORK

Crossing Boundaries of Distance, Countries, and Cultures

CHRIS ERNST

Center for Creative Leadership

ithin the time frame of a single generation, the traditional boundaries for management have been dissolved and replaced by an integrated, interconnected global economy. Pick up any newspaper, scan the recent business publications in your local bookstore, or surf the Web and you are certain to encounter the word "global." Not since the time that nations industrialized their economies have we encountered such powerful economic forces as those presently brought by the marriage of information technology and globalization. Succeeding in the global economy has risen to the top of many organizational agendas, and in increasing numbers, it is global leaders who are asked to lead the way.

Unfortunately, these transformations have occurred at such a pace that we have had little time in the organizational field to gain consensus as to what globalization and its consequences mean for management. Currently, the global management and leadership literature lacks theoretical ground, and there are multiple competing frames of reference. While it is beyond the scope of this chapter to create consensus around this topic, this chapter does seek to outline and frame the key contextual issues, concepts, and current directions that inform the research and practice of global management in the 21st century.

Simply put, global management is defined by its context. This context is one in which global organizations operate across national borders, simultaneously achieving the twin

aims of global integration and local differentiation. This environment is understood in the field to be both quantitatively and qualitatively more complex than the one in which more traditional (and researched) types of leadership take place. In navigating this complexity, global management can be defined as leadership processes enacted across interacting boundaries of distance, country, and culture. The opening section of this chapter seeks to embed global management within its context.

The next section identifies some of the key concepts in the study of global management. At present, the literature remains largely at a conceptual stage. Fortunately, however, a core set of ideas serves as touchstones. The global management concepts that will be discussed in this section include (a) culture shock, (b) global mind-set, (c) cultural adaptability, (d) cross-cultural values, (e) cultural intelligence, (f) learning to learn, and (g) global leader competencies.

The final two sections of this chapter explore current and future directions in global management for research and practice, respectively. In terms of research, a number of established theories and models can be applied to investigations of global management. Those covered in this chapter include (a) behavioral complexity, (b) social identity theory, (c) boundary role theory, (d) connected/relational leadership, (e) and corporate social responsibility. Linking global management to existing theories such as these is critical for

new papers and knowledge in this area to progress. Finally, from an applied perspective, new knowledge can also be gained by linking global management to key organizational issues. This chapter concludes by exploring issues of global management in light of the following: (a) selection, (b) performance appraisal, (c) talent management, (d) leadership development, and (e) organizational culture.

As the breadth and depth of globalization expands, we are advancing toward a time in which all leadership will become global in scope. Thus, research and inquiry into this topic will remain timely and relevant throughout the 21st century. Let us now discuss the complex context in which global management takes place.

CONTEXT: UNDERSTANDING AND DEFINING GLOBAL MANAGEMENT

There is a growing sense that events occurring throughout the world are converging rapidly to shape a single, integrated world where economic, social, cultural, technological, business, and other influences cross traditional borders and boundaries such as nations, national cultures, time, space, and industries with increasing ease.

—Barbara Parker

Reports in the academic and popular press make it clear that organizational life, as well as life apart from organizations, transpires in deference to an increasingly global and interconnected world. Most would surely agree that the changes brought forth by globalization have a significant impact on leadership and managerial processes. The removal of boundaries and increasing connections create both challenges and opportunities for leadership. In this section, we explore the context of global management beginning with its origins.

Origins of Global Management

Prior to the mid-1980s, "global management" was not a commonly used term. Up until this time, the leadership context was not global in scope but rather focused on "international," "cross-cultural," or "expatriate" issues. Much of this research was conducted on noncorporate populations including samples of Peace Corps workers, international diplomats, missionaries, and the military. A common thread in this early research was the identification of various challenges these groups experienced in working effectively in other cultures. For example, the challenge for the Peace Corps volunteer is to relocate and adjust to living in another culture while assuming the role of teacher and helper. The role of the international diplomat is to relocate and adjust to living and working in another culture in order to represent the interests of the diplomat's country at a high level of political sensitivity. The role of the military spouse may be to relocate and adjust to living in an enclave of fellow expatriates. A central concept emerging from this early research is the notion of culture shock. Culture shock, defined in terms of the anxiety associated with interactions with cultural difference, will be discussed more in the next section.

Early studies in the organizational arena, however, focused largely on issues of expatriation. An expatriate (or more popularly referred to as an "expat") is an employee who voluntarily leaves his or her country for a temporary assignment in a foreign country. Black and Gregersen (1999) summarize much of the knowledge in this arena into three general areas of best practice: sending the right people (selection) for the right reason (strategy) and providing the right ending (repatriation). Much of the literature is based on the argument that the expatriate failure rate is uncharacteristically high. Research has identified a number of individual factors (e.g., personality attributes, willingness to relocate, family issues) and organizational factors (e.g., lack of or ineffective selection, orientation, compensation, and training systems) that are attributable to expatriate failure. Research in this area is valuable given the significant organizational cost associated with expatriating and repatriating employees.

While global management research finds its roots in the types of issues just discussed, it is critically different in the following way: Global management is concerned with the interactions of leaders across multiple country and cultural contexts, while international or expatriate management focuses on the interactions of a manager within a single culture. This difference will come more into focus in the following discussion.

GLOBAL ORGANIZATIONS

The world of the global organization is one in which variety, complex interactions among various subunits, host governments, customers, pressures for change and stability, and intricate webs of networked relationships are the norm. Although there is no universally accepted definition of a global organization, there is general consensus that an organization evolves through distinct stages or forms as it globalizes. To illustrate, consider the framework in Table 82.1.

As an organization progresses through the various stages from domestic to global, there is an increase in the complexity of its structure, strategy, and systems. A key characteristic, as defined by Bartlett and Ghoshal (1989) in their seminal book, *Managing Across Borders*, is that global organizations operate across national boundaries, simultaneously achieving global integration while retaining local differentiation. The central component of this definition is that a global organization achieves across country coordination, allowing it to capture global-scale economies while also responding to local needs. For example, Rhinesmith (1993) writes that global organizations "think globally and

Table 82.1 Four Organizational Forms				
Organization Form	Description of Activities	Organization Focus		
Domestic	Operates in home country only; serves only domestic market	Focus is purely domestic		
International	Either engages in exporting or in the development of assembly and production facilities in global markets	Focus is domestic, but with a global component		
Multinational	Integrates domestic and global operations into worldwide lines of business; services and products are largely standardized; major decision-making takes place in home country headquarters	Focus is global, but services and products are standardized globally, and decision-making is local		
Transnational	Integrates domestic and foreign operations into worldwide lines of business; products are mass customized—tailored to individual country or cultural needs, and decision-making and strategy is distributed across multiple headquarters in numerous countries	Focus is global, services and products are tailored to local needs, decision-making is global		

SOURCE: Adapted from Adler and Bartholomew, 1992.

act locally" while Prahalad and Doz (1987) state that "globalization"—the process of managing cross-country coordination while simultaneously capturing and responding to local need—is central to global competitiveness.

To balance local and global forces, structure, strategy, and systems must be determined by the task. Some activities of the organization may be organized geographically, some by function, and some by product line. For example, a global organization whose product is sports apparel might design the clothing in the United States, secure the fabric in China, manufacture it in Pakistan, and sell it through a chain of stores located in the United States, Canada, Europe, Singapore, and Japan. All of the activities of these organizations are planned, managed, coordinated, and led from a central office that may be located anywhere in the world. If the political climate becomes too unstable in China, sourcing can be moved to Mexico; if labor costs become too expensive in Pakistan, manufacturing can be relocated to Bangladesh. Because time-to-market is of critical importance in the sports apparel industry, the company may have two factories, one in Pakistan and one in Bangladesh, each operating at half capacity, so that in the event of instability one can be shut down and the other can take up the slack without missing a beat.

Expand this example for every product the company has—shorts, bathing suits, baseball caps, sweat suits—each with the potential for a shared or different process of sourcing, manufacturing, distributing, and selling, and we see the world of the global organization. Rhinesmith (1993) emphasizes that this type of organization represents a wholly new paradigm for management. It requires organizational alignment along three broad dimensions: (a) strategy and structure, (b) corporate culture, and (c) people. Of the three dimensions, people are the critical factor because it is through people that the strategy, structure, and corporate culture are enacted. No strategy, no structure, and

no corporate culture can operate without people who can actually do the job.

Global Management

As stated earlier, the term "global management" is defined by its context. The common theme across the past discussion is one of increasing complexity as the organizational context shifts from domestic to global. Thus, global management can be defined within this context as processes of leadership enacted across the complex, interacting boundaries of distance, country, and culture (Dalton, Ernst, Deal, & Leslie, 2002):

- Distance refers to the complexity that accrues working within and across physical distance. Because leaders in global organizations work across distance, they must effectively negotiate multiple time zones, monitor information around 24-hour business cycles, and work with others that they cannot see (e.g., virtual management, geographically dispersed teams).
- Country refers to the complexity that accrues working within and across national infrastructures. Because leaders in global organizations work across countries, they must effectively address multiple political and regulatory structures, economic systems, currency variations, and civic and labor practices.
- Culture refers to the complexity that accrues working within and across cultural differences. The world is marked throughout by incredible diversity in language, thought, norms, rules, and organizing principles. The interactions of these social processes are often laden with tension and ambiguity. Because leaders in global organizations work across cultures, they must interact with diverse individuals and multicultural teams, with basic and fundamental differences in norms, beliefs, and values.

Table 82.2 Differences Between International and Global Management					
Behavioral Requirement	International Management	Global Management			
Global Mind-Set	Emphasis on a single foreign country and the relationship between headquarters and that country	Understands worldwide business context and trends from a global mind-set			
International Business Knowledge	An expert on one culture and country	Learns about multiple cultures, perspectives, trends, technologies, and approaches to conducting global business			
Global Learning	Works with and coaches people in each country separately or sequentially	Works with and learns from diverse people from many countries simultaneously			
Adaptability	Adapts to living in a new, foreign culture often for a defined period of time	Adapts to living in many foreign cultures over any given time			
Innovation	Seeks to create new and novel solutions within a country or market	Seeks to create new and novel solutions out of the synergies of multiple countries and markets			
Cross-Cultural Skills	Enacts cross-cultural interaction skills primarily on specified foreign assignments	Enacts cross-cultural skills on a daily basis throughout his or her career			
Collaboration	Interacts with colleagues from within defined hierarchies of structural and cultural patterns	Interacts with foreign colleagues as equals, often in peer and lateral-type relationships			
Virtual Interaction	Works face-to-face with a majority of colleagues and virtually with a minority of colleagues as needed	Works daily with "distant majorities" through email, phone, and videoconference			

SOURCE: Adapted from Adler and Bartholomew, 1992.

When we multiply each of these dimensions by the number of time zones, countries, and cultures in which a manager works, the complexity becomes more evident. When you schedule a teleconference, there is often a person in a different time zone at the other end of each line. When you are sitting in a meeting, say in Japan, you must be aware of the Japanese differences in currency exchange rates, corporate governance, political legislation, and unions while also keeping in mind the country infrastructure of the multiple locations in which your company does business. When you get off a plane, a different set of cultural expectations waits for you at the gate.

As this discussion illustrates, the context of the global manager is one of increasing complexity, requiring leaders to work simultaneously across borders of physical distance, country infrastructures, and cultural expectations. Central to the definition is the need to work simultaneously and from a distance with individuals from multiple cultures. As described by Adler,

Global leadership theory, unlike its domestic counterpart, is concerned with the interaction of people and ideas among cultures, rather than with either the efficacy of particular leadership styles within the leader's home country or with the comparison of leadership approaches among leaders from various countries—each of whose domain is limited to issues and people within their own cultural environment. (1997, p. 175)

As the form of an organization evolves, the environment imposes a more complex set of management demands. Some of these differences are shown in Table 82.2.

Table 82.2 suggests that the general behavioral requirements—for example, a "global perspective"—are the same, but that the level of difficulty and consequently the level of skill are greater when an organization's form shifts from international to global. Whereas leaders in an international organization focus on a single foreign country, leaders in a global organization must understand and operate within the worldwide business environment. It is the infinite variety of factors that exist within this worldwide environment that render it qualitatively and quantitatively different. It is the added complexity that accrues working across the intersections of distance, country, and culture that is the hallmark of management in the global context.

CONCEPTS: EXPLORING THE KEY PRINCIPLES UNDERLYING GLOBAL MANAGEMENT

There is no Holy Grail, no magic bullet, no rosette stone of global leadership. The riddle has many answers.

—George Hollenbeck

No single unifying concept frames the topic of global management. Global management is better considered a unique context for leadership in which multiple concepts can be

developed. For the scholar or practitioner of global management, you will encounter many views and a varied set of ideas. Here we turn to discuss some of the most frequently referenced concepts. This is not meant to be an exhaustive list; rather, the hope is to define the key terms in the literature.

Culture Shock

Oberg (1960), a pioneer in studying cross-cultural adjustment, coined the term culture shock. As mentioned earlier, this concept was originally constructed to describe the adjustment experience of a sojourner or expatriate to another culture. Oberg defines culture shock as the anxiety that results from an individual's attempt to process and understand how the world works in a different cultural context. Culture shock is a form of anxiety that results from the misunderstanding of commonly perceived and understood signs of cultural interaction. Interestingly, Adler's (1997) research treated culture shock as a developmental opportunity rather than an obstacle to overcome. The shock associated with cultural difference allows a person to understand the relativity of his or her own value set and then investigate, reintegrate and reaffirm a relationship to others. Whether it is viewed as a challenge or an opportunity, culture shock is a concept many of us have experienced in our interactions across cultures.

Global Mind-Set

The phrase "global mind-set" lacks a single definition and has become an umbrella concept to describe the constellation of skills, knowledge sets, and attitudes of effective global leaders. The global mind-set is most often defined as a state of mind—a perspective for viewing the world in which any business, industry sector, or particular market is viewed on a global basis. For example, Gupta and Govindarajan (2002) define a global mind-set as the ability to combine an openness to diversity across cultures and markets while also being adept at synthesizing across this diversity. The key is that leaders with a global mind-set have the ability to see across multiple territories and focus more on commonalities across markets rather than emphasizing the differences amongst countries.

Global mind-set is generally considered an attribute of a person; however, more recent literature has described it in terms of an organizational capability. Begley and Boyd (2003) argue that it is no longer sufficient for a limited number of executives to have a global mind-set. They describe a "corporate global mind-set" as a competitive advantage in which the organization is capable of developing and interpreting criteria for business performance that is not subject to models from any one country, culture, or context and can implement those criteria in an appropriate way across global contexts. Central to this organizational capability is

the capacity to balance and adjudicate between two forces that are inherently in conflict with one another: global consistency and local responsiveness.

Regardless of whether global mind-set is defined at an individual or organizational level, the concept of global mind-set is firmly established in the lexicon of global management.

Cultural Adaptability

The concept cultural adaptability, like global mind-set, has a rich and varied history. It can be defined as the motivation and ability to adapt one's behavior to the established norms, values, beliefs, and customs that prevail as a societal-level prototype in a given geographical location (Deal, Leslie, Dalton, & Ernst, 2003). As the concept is understood in the literature, cultural adaptability involves a motivation to understand culture, a sensitivity to differences between cultures, an ability to change behavior to fit with new environments, and the skill to learn about and adapt to cultural differences.

In an article published nearly 20 years ago, Ratiu (1983) was one of the first to examine the role of cultural adaptability in determining the success of global leaders, or "internationalists." One characteristic of successful internationalists, Ratiu argued, is that they begin with general knowledge or prototypes of cultures when first dealing with different cultures. As they get to know people from those cultures as individuals, however, successful internationalists let go of or adjust elements of their prototypes and gain a less stereotypical knowledge of the cultures and their people. Unsuccessful internationalists either do not start with prototypes (and as a result interpret everything based on their own mental frameworks) or are unable to discard their prototypes despite evidence gathered from their relationships with people from other cultures that ought to dispel these preconceptions.

More recent research has looked at the relationship between cultural adaptability and job effectiveness. For example, Spreitzer, McCall, and Mahoney (1997) found that boss ratings of an individual's potential success as an international executive were related to ratings of cultural adaptability. To become better grounded in the concept of cultural adaptability, the reader may want to also consult literature in the areas of interpersonal adjustment, international experiences, and cross-cultural training.

Cross-Cultural Values

Extending from the work of Hofstede (1980) in his pioneering book, *Culture's Consequences*, research into differences in cross-cultural values has spanned the social sciences including psychology, sociology, communications, and anthropology. Other well-known researchers in this area include Shalom Schwartz, Harry Triandis, and

Fons Trompenaars. Value studies involve collecting large samples of individual-level data within culture and then drawing aggregate comparisons across cultures. The result is a framework or model to explain similarities and differences in cultural values. Within the business arena, the cultural dimension of individualism (more associated with the West) and collectivism (more associated with the East) has been used to explore differences in everything from collaboration to conflict and from mergers and acquisitions to performance appraisal.

While relevant to global management, research in this area is limited in producing results that are broad enough to impact the cross-boundary operating reality of global leaders. One exception comes from the current GLOBE project (House, Hanges, Javidan, Dorfman, & Gupta, 2004). The GLOBE project is exemplary in that its findings are based on a sample of approximately 17,000 middle managers working in 900 organizations from three sectors in 62 countries around the world. The project seeks to refine societal cultural dimensions and link these dimensions to organizational culture and leadership. Of specific interest to global management is the set of leadership characteristics that were identified in the research as being universally positively endorsed by people in most countries in the sample. For example, attributes such as trustworthiness, dependability, and intelligence were endorsed as being associated with effective leadership across continents and cultures. Yet, it is important to note that the relative importance of each of these characteristics, as well as the specific behaviors that exemplifies these characteristics, varies from country to country.

Cultural Intelligence

In their book, Earley, Ang, and Tan (2005) describe cultural intelligence (also known as cultural quotient or CQ) as a person's capability to function effectively in situations characterized by cultural diversity. Cultural intelligence is an individual capability that distinguishes intelligence as more than cognitive ability. Like other types of intelligence (e.g., interpersonal, emotional, social), cultural intelligence focuses on capabilities that are important for high-quality personal relationships. As such, it provides insights into how leaders address multicultural situations, engage in cross-cultural interactions, and perform in culturally diverse work groups.

As a relatively new area of inquiry, cultural intelligence builds on each of the concepts previously discussed. A strength of CQ is that it can be measured through a 20-item scale measuring the four dimensions—CQ-Strategy, CQ-Knowledge, CQ-Motivation, and CQ-Behavior. Early research has linked cultural intelligence with effective decision making in intercultural situations and with adjustment perceptions in culturally diverse situations. Further study in this area will be helpful in understanding the antecedents and consequences of CQ and how it is similar or different from other types of intelligence.

Learning to Learn

Several decades' worth of research at the Center for Creative Leadership demonstrates that the ability to learn from experience is related to effectiveness in a variety of leadership roles and contexts. For example, McCall, Lombardo, and Morrison (1988) found that about 70% of the important lessons that effective managers had learned about their work were developed from a variety of challenging experiences and critical relationships. Similar types of findings have now been replicated with global manager populations by McCall and Hollenbeck (2002) and by Dalton, Ernst, Deal, and Leslie (2002). Specifically, these studies show that it is the unique lessons learned from culture that differentiate the developmental pathways for effective global leaders as compared to domestic leaders.

The implication of research in this area is that individuals or organizations that aspire to develop global management capabilities should support and seek out the following kinds of international assignments: international business trips, membership on cross-cultural teams, management responsibility for a cross-cultural team, expatriate assignments, responsibility for products, services, or processes in more than one country, and opportunities to work with experienced global executives. Each of these assignments provides a different kind of stretch and the opportunity for both cumulative and differentiated learning to occur. Further, the developmental impact of these assignments (as well as other learning opportunities) will be enhanced to the extent that they contain a rich mixture of three primary strategies: assessment, challenge, and support.

Global Leader Competencies

As the competency movement remains pervasive in the human resources and leadership development fields, there is no shortage of competencies to describe effective global management. Competencies consider the knowledge, skills, abilities, motivations, and perspectives that are believed to be associated with leadership effectiveness. As such, they focus on characteristics of the individual manager. In the literature, global leaders are characterized by such colorful descriptions as cultural synergizers, true planetary citizens, cross-fertilizers, cosmopolitans, and perpetual motion executives.

In addition to these descriptions, the current literature is replete with taxonomies and lists of various traits and skills believed to be associated with effective global leadership. These lists are derived from organizational researchers and practitioners through case studies, interviews, and observations. For example, Kanter's (1995) model involves the 3Cs—concepts, competence, and connections. Gregerson, Morrison, & Black (1998) identified the competencies of inquisitiveness, personal character, duality, and savvy; and Rosen (2000) called for the new "global literacies" of leadership to include personal literacy, social literacy, business literacy, and cultural literacy. This is just a small sample of

the literature associated with the burgeoning competency movement. As will be discussed in the section that follows, there are both strengths and limitations associated with this ever-growing body of knowledge.

CURRENT DIRECTIONS: GLOBAL MANAGEMENT RESEARCH IN THE 21ST CENTURY

Research on global managers is relatively scarce. Besides defining what the global manager's competencies and behaviors should be . . . studies are still mainly at the conceptual stage.

---Vladimir Pucik and Tania Saba

The major strength of the literature covered to this point is that it is rich in description. Research conducted over the course of the past decade—some of which has been conducted by top researchers in the field of organizational studies—has adequately defined the characteristics of global organizations and global management. We now have a clearer understanding of what a global organization is, as well as the roles and responsibilities of leaders who work within these organizations. Global managers and organizations function across distance, country, and cultural borders. At both the individual and organizational level, the literature is consistent that the net effect of functioning across country borders is heightened complexity. The degree of overlap and agreement concerning this effect is striking.

The major limitation of the reviewed literature is that it is theory poor. In its effort to describe the context and concepts of global management, the literature runs the risk of incoherence. Although there is overlap in the concepts and competencies just discussed, it is difficult to know which description is the best or most appropriate. Further, without a theoretical framework, it is challenging to attempt and replicate study findings and build an integrated base on knowledge. Clearly, the literature has reached a point of diminishing returns in which it is no longer helpful to create additional global leader competencies. What is of significant value, however, is research to link global management to existing and emerging theory. To help encourage future thinking in this direction, several of the more promising theories are described next. Each of the following theories could be used to anchor future papers on global management.

Behavioral Complexity

Behavioral complexity, developed in a recent line of research conducted by Hooijberg and colleagues (Hooijberg, Hunt, & Dodge, 1997; Hooijberg & Quinn, 1992) is defined as the ability to both perform and adapt to multiple behavioral roles as dictated by the organizational and environmental context. The construct is theorized to have a repertoire and a differentiation component. Behavioral rep-

ertoire refers to the portfolio of roles that a leader can perform and behavioral differentiation refers to the ability of leaders to vary the performance of their roles depending on the situational context. The notion of behavioral complexity gives recognition to the fact that leaders are embedded in a dynamic, evolving environment and therefore must be able to assume different, contradictory, or even competing roles in different times and situations.

Related to global management, a central proposition of research in this area is that if complexity is a defining characteristic of the environment, then behavioral complexity—defined in terms of the ability to perform and to adapt multiple roles—must also be reflected in the capacities of the effective leader. Beyond more static behavioral or contingency leadership models, this proposition lends itself nicely to the types of complexity associated with global management. The development of multiple and diverse roles, and the ability to adapt roles to the situation, might be one way in which global leaders can work effectively and meet the demands of an increasingly complex, global business environment.

Social Identity Theory

As global managers increasingly interact with others who belong to different social and cultural groups, one may wonder if the world will become "small" enough that individuals may define themselves not as much as members of a particular cultural, racial, or ethnic group, but rather as members of the human race. The psychological theory of social identity suggests that this is not likely because of the well-established human tendency to categorize people into groups of "people like me" and "people not like me."

In their book *Intergroup Behavior*, Turner and Giles (1981) write that social identity theory presumes that an individual's self-concept is derived from membership in a social group together with the emotional value attached to that membership. Social identity theory suggests that individuals engage in a cognitive process in which they classify themselves and others into categories or groups. This categorization process serves two functions: it provides individuals with a systematic means of defining others, and it allows the individual to define him- or herself within the social environment.

If the essence of global management is about bringing groups of people together across distance, countries, and cultures, then social identity theory is helpful in understanding the boundary conditions and challenges that global leaders face. Due to powerful forces such as globalization, technology, shifting social structures, and evolving organizational forms, the demographics of the workforce will become yet more diverse in the 21st century. Groups of people who have historically remained apart are now "colliding" in the workplace. For example, we see Protestants and Catholics working together for U.S. computer companies in Northern Ireland or Blacks and Whites collaborating in a post-Apartheid South Africa. Papers exploring the

linkages between global management and social identity will be helpful in better understanding the role of leadership in these emerging contexts of difference.

Boundary Role Theory

A "boundary" is defined as a type of border, barrier, or limit. As daily life is largely about navigating or crossing various barriers and limits, research has examined the challenges and opportunities associated with organizational boundaries. Seminal papers on boundary roles or boundary spanning include Adams (1976) description of the "boundary role person," Tushman's (1977) explication of boundary spanning and innovation processes, and Ancona's (1992) work on boundary-spanning teams. Currently, the boundary-spanning literature focuses primarily on crossing or spanning interorganization, team-organization, and organization-environment boundaries. Within a leadership context, Alter and Hage (1993) describe a boundary spanning leader as "one who works across organizational or sectoral divides to build common commitment to action on a particular policy or practice issue."

The work of global management requires leaders to integrate and coordinate activities across boundaries of distance, country, and culture. Preliminary research that I conducted demonstrated that practicing global leaders viewed external boundary-spanning roles such as serving as a spokesperson or liaison as being more important to perceptions of their job effectiveness than more internal-facing, organizationcentric roles. Global management requires cutting across boundaries in order to move ideas, information, decisions, talent, and resources wherever they are needed most. Research on boundary spanning and global management will be helpful in addressing questions such as, What are the role demands for global managers? What traits are required for such a role? What activities are performed by boundaryspanning leaders? How do boundary spanners reach across social and organizational barriers and divides?

Connected or Relational Management

Research in the area of connected or relational leadership works from the assumption that leadership is less about the unique properties of individual leaders and more about the dynamic relationships that bind groups of people together. From this perspective, leadership can be defined as the collective activity of groups of people to set direction, maintain alignment, and gain commitment (McCauley & Van Velsor, 2004). By viewing leadership as an outcome to be achieved by the organization or collective rather than a skill or role that a person possesses, it becomes possible to view leadership from a broader, more inclusive lens. According to this definition, leadership would be exercised when a CEO articulates a compelling mission that sets organizational direction; when a cross-functional group reaches

across organizational boundaries to align IT systems; and when organizational members come together to confront a complex challenge and develop greater trust and respect through their interactions.

As discussed earlier in this chapter, the majority of current research looks at the unique competencies and skills of effective global leaders. This research is limited in that (a) it is difficult to break global management effectiveness down into discrete components, (b) competencies are static and cannot adapt to changes in the dynamic global context, and (c) there is more than one kind of effective global manager. Improving upon these shortcomings, future global management research would benefit from taking a whole systems relational approach. These studies could bring new understanding of what leadership looks like in networked, interdependent, team-based organizations. Further, they could help diverse and global populations identify new ways to view power, resources, and decision making as a property of the whole rather than simply the "person in charge." Finally, connected or relational leadership approaches could open new methods for leadership development that seek to develop the linkages and connections that glue people together in global organizations.

Corporate Social Responsibility

An important debate is taking place in the 21st century concerning the role of global business in the broader society. Upbeat participants in this debate feel that global business will provide worldwide growth and development opportunities. According to this viewpoint, the economic impact of globalization will create employment opportunities for the world's impoverished, help create desperately needed infrastructure in developing economies, and contribute to the correction of global social challenges. Others, far less optimistically, believe that global business will lead to further and continued exploitation of foreign workers, the continued cycle of dependency between the developed and developing world, and the accelerated destruction of natural resources and local cultures. Proponents of this point of view argue that the forces driving global business will undermine the power of local and national governments and will weaken the ability of policymakers to control key social and economic processes.

Finally, between these two extremes are those who hold a more balanced perspective. Under the theoretical umbrella of "corporate social responsibility" or "CSR," advocates of a balanced position argue that in a compressed and interconnected world, global business and the broader society must work together to the mutual benefit of one another. Global organizations by their very existence have an impact within the social fabric of countries and therefore bear a responsibility for working with religious organizations, governments, and nongovernmental organizations to strengthen that fabric.

Regardless of perspective, the implication of this debate is that in today's interconnected world, developing political, social, and environmental awareness and knowledge is an integral aspect of a global leader's job, not something separate from it. Through the decisions they make in promoting the interests of their businesses, global leaders affect the well-being of people in multiple cultures and the practices of business in multiple countries. As such, global managers have a responsibility to understand what positions they are taking through their actions and must be prepared to revisit, renew, and revise those positions over time. To support leaders in this endeavor, future research is needed to determine the role of global business at the intersection of the organization with broader social, economic, political, and environmental forces.

CURRENT DIRECTIONS: GLOBAL MANAGEMENT PRACTICE IN THE 21ST CENTURY

The clear issue is that the strategy (the what) is internationalizing faster than implementation (the how) and much faster than individual managers and executives themselves (the who). The challenges are not the "what" of what-to-do, which are typically well-known. They are the "hows" of managing human resources in a global firm.

-Nancy Adler and Susan Bartholomew

As globalization continues to accelerate in the 21st century, organizations will remain challenged to keep pace. While the previous section examined linkages that could be drawn between global management and theory, this final section looks at the connections between global management and practice. Specifically, we examine the implications of global management for a number of applied topics including selection, performance appraisal, talent management, leadership development, and organizational culture. Successful organizations are required to create, modify, or adopt human resource systems and processes to mesh with the needs of an increasingly global business environment. As you will see, each of the following topics are "the same, but different" when framed in the global vis-à-vis a domestic management context.

Selection

Selection involves the identification, recruitment, and hiring of people to fill the human capital needs of an organization. A widely noted criticism of many selection processes is that they assume that past performance is the best predictor for future performance. This critique is especially pertinent in the global arena. As has been discussed throughout this chapter, the skills that are needed

to be effective globally are in many ways unique from the skills needed for effectiveness in a domestic context. Hiring global leaders solely based on their performance in domestic roles will surely prove a limited strategy.

The selection of leaders for global roles must broaden beyond past performance to include a consideration of international experience and interest. A first step in the process is for organizations to identify people early in their careers who show a liking for travel, novelty, and international work, who speak other languages, and whose life experience includes time spent living in foreign locations. Each of these can serve as markers for identifying future global talent.

Another step involves assessing for global management skills. Many of the concepts in this chapter such as cultural adaptability or cultural intelligence can be measured. A third step involves using role plays or simulations to observe candidates in practice. Using these methodologies, it becomes possible to observe behaviors such as adaptability and flexibility that are critical for effectiveness in global roles. While some aspects of the employee-selection process can remain intact, other aspects need to be tailored given the unique demands of global management.

Performance Appraisal

Performance appraisals are regular reviews of employee performance within organizations. A common approach to assessing performance is to use a numerical rating in which managers are asked to evaluate an individual against a number of standardized objectives. The challenge for traditional performance approaches, however, is that the standards for performance vary from country to country. That is, the definition of what makes for an effective global manager is culturally contingent.

Derr and Laurent (1989) conducted a now classic study of what American and European managers believe constitutes effective managerial performance. They found that Germans value managers who are technically creative and competent. The French value managers who have the ability to manage power relationships and work the system. The British value managers who create the right image. Americans value entrepreneurial behavior. Certainly this list would be even more varied and complex if extended to also include leaders from Africa, the Middle East, Asia, South America, and beyond.

Given these realities, organizations will increasingly need to create more flexible performance appraisal systems. One option is to create two sets of appraisal objectives—one set that is universal across cultural and country contexts and another that is responsive to local needs. A second option may be to keep the objectives fixed, but to allow freedom in defining the specific behaviors and attributes that constitute the objective. For example, "being decisive" could be a fixed objective globally, while the behaviors that

demonstrate effectiveness could vary across countries. Yet a third option is for an organization to focus its performance appraisal on a more limited set of objectives that transcend cultural boundaries.

Of all the concepts previously discussed, the ability and willingness to "learn from experience" stands out as a metacompetency for effectiveness in today's organizations. Learning behaviors include accepting or seeking out new and unfamiliar challenges, persistence in the effort to master a difficult task, the demonstration of a willingness to learn from the experience of others, a willingness to admit not knowing how to do something, and an openness to feedback about one's efforts and impact. Of course, even evidence of the willingness to learn is culturally contingent. Yet, without question, the ability to learn from experience and adapt accordingly is a hallmark for effective global leaders in the 21st century.

Talent Management

Talent management is a comprehensive phrase that focuses on the proactive management of people throughout the employee life cycle. Effective talent management systems involve a global approach in which the best and brightest are identified, developed, and promoted wherever in the world they may be located. Unfortunately, it is common knowledge in many international organizations that only people who are native to the organization's home country will ever be promoted beyond a certain level. This kind of practice, whether unconscious or intentional, will cause employee morale, commitment, and retention problems around the world. Talented employees are unlikely to remain with organizations if they know that they are trapped below a country-based "glass ceiling."

This practice has important implications for an organization's global strategy. There are three visible indicators of how serious an organization is about its global intentions—the composition of the board of directors, the executive team, and the talent pool. To the extent that the board of directors and executive team are monocultural, the organization is not yet global. To the extent that the talent pool is comprised of people from one or a very limited number of countries, the company is not fully harnessing the capabilities of its people. As such, an important human resource task is to open the talent pool worldwide. The management development process should include candidates from every geographic location of strategic importance.

Leadership Development

In a survey conducted with senior executives in 108 Fortune 500 companies, Gregersen, Morrison, and Black (1998) found that having skilled global leaders was the single most important factor cited in achieving global success, more so than factors such as financial resources, political

stability, tariff/trade restrictions, and information technology. Yet, these same executives felt that their present supply of global leaders did not meet the organizational needs. Eighty-five percent felt that they did not have an adequate number of global leaders, and 67% felt that their existing global leaders needed additional development. To reverse these trends in the future, leader development (focused on developing the attributes of individuals) and leadership development (focused on developing overarching leadership systems and cultures) will need to become an organizational imperative.

Organizations can use a number of processes to develop global managers including individual development planning, training, 360-degree feedback, action learning, mentoring, and coaching. In addition to these methodologies, the development of global leaders requires an intentional and systematic focus in providing on-the-job experience. Simply stated, there is no substitute for cross-cultural experience as the foundation to any process of development for effective global leaders. These experiences should be graduated along a continuum of challenge and complexity ranging from international assignments to having worldwide responsibility for a key organizational product or process.

Organizational Culture

A final applied topic for consideration is to examine the overall culture or climate in which global managers operate. Organizational culture comprises the attitudes, experiences, beliefs, and values of an organization. It impacts everything from the ways in which people interact inside the organization to stakeholder relationships outside the organization. Further, no matter how effective a global manager may be individually, he or she will be limited if the culture itself does not support global organizational values.

Finally, the culture itself will not be globally effective unless large numbers of employees begin developing more globally diverse mindsets and orientations.

Friedman (2005) points out in *The World Is Flat* that globalization has gone through three distinct stages. In Globalization 1.0 (1492 to 1800), based on the activities of globalizing nations, the world shrank from a size large to a size medium. In Globalization 2.0 (1800 to 2000), spearheaded by globalizing markets and corporations, the world shrank from a size medium to a size small. Now, in Globalization 3.0 (starting around 2000), the world is rapidly shrinking from a size small to a size tiny. And while countries and companies were the dynamic force behind the earlier stages of globalization, today it is the activities and behaviors between linked-up individuals and small groups that add further fuel to Globalization 3.0.

The implication of these sweeping societal changes is that "global management" will no longer be the domain of the few in the 21st century, but rather will rest in the hands of the many. Leaders in many levels and types of organizations will increasingly find themselves working simultaneously across the interacting boundaries of distance, country, and culture. And importantly, unlike the European and American leaders and organizations that largely drove the earlier stages of globalization, future global managers will be much more diverse and hail from the global community of nations. Organizations that can foster cultures to embrace this tremendous diversity will be at a distinct advantage in the 21st century.

CONCLUSION

The purpose of this chapter was to outline the key contextual issues, concepts, and current directions that inform the topic of global management. A common thread throughout the chapter was that global management can only be properly understood within its context, a context requiring leaders to work across interacting boundaries of distance, country, and culture. In an increasingly diverse and interconnected world, we are advancing toward a time in which all leadership, by definition, will become global in scope. Thus, research and inquiry into this topic will remain timely and relevant for management throughout the 21st century.

REFERENCES AND FURTHER READINGS

- Adams, S. (1976). The structure and dynamics of behavior in organizational boundary roles. In M. Dunnette (Ed.), *Handbook of industrial and organizational psychology* (pp. 1175–1199). Chicago: Rand McNally.
- Adler, N. J. (1997). Global leadership: Women leaders. Management International Review, 37(1), 171–196.
- Adler, N. J., & Bartholomew, S. (1992). Managing globally competent people. *Academy of Management Executive*, 6(3), 52–65.
- Alter, C., & Hage, C. (1993). Organizations working together. Newbury Park, CA: Sage.
- Ancona, D. G., & Caldwell, D. F. (1992). Bridging the boundary: External activity and performance in organizational teams. *Administrative Science Quarterly*, *37*(4), 634–665.
- Bartlett, C. A., & Ghoshal, S. (1989). Managing across borders: The transnational solution. Boston: Harvard Business School Press.
- Begley, T. M., & Boyd, D. P. (2003). The need for a corporate global mind-set. *MIT Sloan Management Review*, 44(2), 25–32.
- Black, J., & Gregersen, H. (1999, March/April). The right way to manage expats. *Harvard Business Review*, 77(2), 52–62.
- Dalton, M., Ernst, C., Deal, J., & Leslie, J. (2002). Success for the new global manager: How to work across distances, countries and cultures. San Francisco: Jossey-Bass.
- Deal, J., Leslie, J., Dalton, M., & Ernst, C. (2003). Cultural adaptability and leading across cultures. In W. Mobley & P. Dorfman (Eds.), *Advances in global leadership* (Vol. 3, pp. 149–166). San Francisco: JAI Press/Elsevier Science.

- Derr, C. B., & Laurent, A. (1989). The internal and external careers: A theoretical and cross cultural perspective. In M. Arthur, D. T. Hall, & B. S. Lawrence (Eds.) *The handbook of career theory*. Cambridge, UK: Cambridge University Press.
- Earley, P. C., Ang, S., & Tan, J. S. (2005). *CQ: Developing cultural intelligence at work*. Palo Alto, CA: Stanford University Press.
- Friedman, T. (2005). *The world is flat*. New York: Farrer, Straus, & Giroux.
- Gregersen, H., Morrison, A., & Black, S. (1998). Developing leaders for the global frontier. *Sloan Management Review*, 40(1), 21–32.
- Gupta, A. K., & Govindarajan, V. (2002). Cultivating a global mindset. *Academy of Management Executive*, 16(1), 116–126.
- Hofstede, G. (1980). Cultures consequences: International differences in work-related values. Newbury Park, CA: Sage.
- Hooijberg, R., Hunt, J., & Dodge, G. (1997). Leadership complexity and development of the leaderplex model. *Journal of Management*, 23(3), 375–408.
- Hooijberg, R., & Quinn, R. E. (1992). Behavioral complexity and development of effective managers. In R. L. Phillips & J. G. Hunt (Eds.), *Strategic leadership: A multiorganizational-level perspective*. Wesport, CT: Quorum.
- Hollenbeck, G. P. (2001). A serendipitous sojourn through the global leadership literature. In W. H. Mobley & M. W. McCall (Eds.), *Advances in global leadership* (Vol. 2, pp. 15–48). San Francisco: JAI Press/Elsevier Science.
- House, R. J., Hanges, P. J., Javidan, M., Dorfman, P. W., & Gupta, V. (2004). *Leadership, culture, and organizations: The GLOBE study of 62 societies*. Newbury Park, CA: Sage.
- Kanter, R. M. (1995). World class: Thriving locally in the global economy. New York: Simon & Schuster.
- McCall, M. W., & Hollenbeck, G. P. (2002). *The lessons of international experience: Developing global executives*. Boston: Harvard Business School Press.
- McCall, M. W., Jr., Lombardo, M. M., & Morrison, A. M. (1988). The lessons of experience: How successful executives develop on the job. Lexington, MA: Lexington Books.
- McCauley, C., & Van Velsor, E. (2004). The Center for Creative Leadership handbook of leadership development (2nd ed.). San Francisco: Jossey-Bass/Wiley Publishers.
- Oberg, K. (1960). Culture shock: Adjustment to new cultural environments. *Practical Anthropology*, 7, 177–182.
- Parker, B. (1996). Evolution and revolution: From international business to globalization. In S. R. Clegg, C. Hardy, & W. R. Nord (Eds.), *Handbook of organization studies* (pp. 484– 506). London: Sage.
- Pucik, V., & Saba, T. (1998). Selecting and developing the global versus the expatriate manager: A review of the state-of-theart. *Human Resource Planning*, 21(4), 40–54.
- Prahalad, C. K., & Doz, Y. L. (1987). The multinational mission: Balancing local demands and global vision. New York: Free Press.
- Ratiu, I. (1983). Thinking internationally: A comparison of how international executives learn. *International Studies of Management and Organization*, 13(1-2), 139–150.
- Rhinesmith, S. H. (1993). A manager's guide to globalization: Six keys to success in a changing world. Homewood, IL: Richard D. Irwin.
- Rosen, R. (2000). Global literacies: Lessons on business leadership and national cultures. New York: Simon & Schuster.

334 • LEADERSHIP WITHOUT BOUNDARIES

- Spreitzer, G. M., McCall, M. W., & Mahoney, J. D. (1997). Early identification of international executive potential. *Journal of Applied Psychology*, 82(1), 6–29.
- Turner, J. C., & Giles, H. (Eds.). (1981). *Intergroup behavior*. Oxford, UK: Blackwell.
- Tushman, M. L. (1977). Special boundary roles in the innovation process. *Administrative Science Quarterly*, 22(4), 587–605.

CROSS-REFERENCES

Global Business Citizenship: A Model of Social Responsibility and Ethical Behavior for the 21st Century (14) Global Mind-Set (18)

Diversity and Diversity Management in the Age of Globalization (64) Leadership in Interorganizational Networks (79)

PART XIII

Information and Knowledge With Mobility and Ethics

KNOWLEDGE MANAGEMENT

Strategy, Culture, Intellectual Capital, and Communities of Inquiry

Murray E. Jennex

San Diego State University

nowledge management (KM) is a hot topic in many business communities. Although, the title *knowledge management* might suggest a rather simple definition, there are plenty of opinions as to what it is and how it should be used, if used at all. However, because of the ever increasing pace of business development, the task of effective and competitive management of organizations becomes essential and KM, if understood and implemented properly, may be a useful tool for business transformation as well as the key to competitive advantage. This chapter presents an overview of KM including knowledge, knowledge management systems (KMS) communities of practice, knowledge transfer, and KM technologies and of how KM is utilized in organizational initiatives.

KNOWLEDGE

Davenport and Prusak (1998) viewed knowledge as an evolving mix of framed experience, values, contextual information, and expert insight that provides a framework for evaluating and incorporating new experiences and information. They found that in organizations, knowledge often becomes embedded in documents or repositories and in organizational routines, processes, practices, and norms. They also say that for knowledge to have value it must include the human additions of context, culture, experience,

and interpretation. Nonaka (1994) expanded this view by stating that knowledge is about meaning in the sense that it is context specific. This implies that users of knowledge must understand and have experience with the context, or surrounding conditions and influences, in which the knowledge is generated and used for it to have meaning to them. This also implies that for a knowledge repository to be useful it must also store the context in which the knowledge was generated. That knowledge is context specific argues against the idea that knowledge can be applied universally; however, it does not argue against the concept of organizational knowledge. Organizational knowledge is considered an integral component of what organizational members remember and use meaning that knowledge is actionable.

Polanyi (1967) and Nonaka and Takeuchi (1995) described two types of knowledge, tacit, and explicit. Tacit knowledge is that which is understood within a knower's mind and which cannot be directly expressed by data or knowledge representations and is commonly understood as unstructured knowledge. Explicit knowledge on the other hand is that knowledge which can be directly expressed by knowledge representations and is commonly known as structured knowledge. Knowledge transfer in an organization occurs when members of an organization pass tacit and explicit knowledge to each other. Nonaka and Takeuchi (1995) proposed four modes of knowledge creation and transfer.

- Socialization is the process of sharing experiences and, thereby, of creating tacit knowledge such as mental models and technical skills. Tacit knowledge can be obtained without using language through observation, imitation, and practice.
- Externalization is the process of articulating tacit knowledge in the form of explicit concepts, taking the shapes of metaphors, analogies, concepts, hypotheses, or models.
- Combination is the process of systemizing concepts into a knowledge system by combining different bodies of explicit knowledge. Explicit knowledge is transferred through media such as documents, meetings, e-mail, and/or phone conversations. Categorization of this knowledge can lead to the generation of new knowledge.
- Internalization is the process of converting explicit knowledge to tacit knowledge and is closely related to learning by doing.

These four modes or processes show that the transfer of knowledge is dependent upon the transfer of a common understanding from the knower to the user of the knowledge. Common understanding consists of the context (the story behind the knowledge, conditions, and situations that make the knowledge understandable) and the experience (those activities that produce mental models of how the knowledge should be used) expressed in a culturally understood framework.

What is culture and context? The United Nations Educational, Scientific, and Cultural Organization (UNESCO, 2002) stated that culture is the "set of distinctive spiritual, material, intellectual and emotional features of society or a social group and that it encompasses, in addition to art and literature, lifestyles, ways of living together, value systems, traditions and beliefs." The American Heritage Dictionary of the English Language (2000, p. 316) defined context as the part of a text or statement that surrounds a particular word or passage and determines its meaning and/or the circumstances in which an event occurs. Culture forms the basis for how we process and use knowledge by providing belief frameworks for understanding and using the knowledge; context provides the framing for the knowledge explaining how it is created and meant to be used. Both are critical to the transfer and reuse of knowledge. We normally expect explicit knowledge to be easily transferred while we expect issues with transferring tacit knowledge. However, we are finding that transfer of either dimension of knowledge in a multicultural environment is not easy.

Why consider culture? Hofstede (1980) refined the definition of culture as the following:

Culture consists in patterned ways of thinking, feeling and reacting, acquired and transmitted mainly by symbols, constituting the distinctive achievements of human groups, including their embodiments in artifacts; the essential core of culture consists of traditions (i.e., historically derived and selected) ideas and especially their attached values. (p. 25)

His work focuses on identifying cultural differences between nations and illustrates that value systems are not the same the world over. The key to the impact of culture on knowledge transfer is how values impact how different social groups will externalize metaphors, analogies, hypotheses, and models; how groups will systemize concepts; how groups internalize concepts; and how groups understand experiences. Differences in culture and, as Hofstede (1980, 2001) showed, significant differences between nations can lead to differences between national groups within the same organization, which can cause those groups either to understand knowledge differently or to have significant barriers to participating in the sharing of knowledge. We must understand that culture is a unique component, so deeply embedded into peoples' lives that our ignorance of it usually leads to failures. KMS as well as other systems created to improve organization's performance should use all possible information about culture to escape system's mistakes due to lack of cultural awareness and understanding. Probably no theory ever will be capable to capture all or even full knowledge about a specific culture, but there are enough theories (as previously discussed) to establish a process and methodology for including cultural parameters in the design of KM initiatives and the system analysis and design activities.

Why consider context? Davenport and Prusak (1998) found that for knowledge to have value it must include the elements of human context, experience, and interpretation (p. 5). Nonaka (1994) expanded this view by stating that knowledge is about meaning in the sense that it is context specific. This implies that users of knowledge must understand and have experience with the context (surrounding conditions and influences) in which the knowledge is generated and used for it to be meaningful. This suggests that for a knowledge repository to be useful it must also store the context in which the knowledge was generated. The suggestion that knowledge is context specific argues against the idea that knowledge can be applied universally.

Context is the collection of relevant conditions and surrounding influences that make a situation unique and comprehensible to the users of the knowledge (Degler & Battle, 2000). Context can be stored with knowledge and/or can be possessed by knowledge users. When a system's knowledge users are known, the knowledge that is captured is used to support specific activities. KMS users are readily known when the KMS is built to support a specific team, project, or process and the users are those involved with that team, project, and/or process. These users tend to possess a high degree of shared understanding where understanding incorporates context and experience. Experience is what knowledge users use to generate mental models of how to use or apply the knowledge (Degler & Battle, 2000). Experience comes from the individual's own experience with the knowledge domain, others' shared experience with the knowledge domain, and/or a collective experience with the knowledge domain (Degler & Battle, 2000). Combined, this means that knowledge users in teams, projects, or even processes understand the organizational culture, the structure of organizational documents, the organizational terminology and jargon, and how the organization works, and they are able to use posted knowledge, even if it does not include context, as they implicitly understand the context in which the knowledge was created and have experience in using this knowledge. On the other hand, when KMS users are not known, it is not possible to assume that these users possess a common understanding or experience associated with the generation of the knowledge. This means the KMS will have to capture this context and experience for users to be able to utilize the captured knowledge effectively.

KNOWLEDGE MANAGEMENT

KM is better understood when the concepts of organizational memory (OM) and organizational learning (OL) are incorporated. Jennex and Olfman (2002) found that the three areas are related and have an impact on organizational effectiveness. Organizational effectiveness is how well the organization does those activities critical to making the organization competitive. OL is the process the organization uses to learn how to do these activities better. OL results when users utilize knowledge. That OL may not always have a positive effect is examined by the monitoring of organizational effectiveness. Effectiveness can improve, get worse, or remain the same. How effectiveness changes influences the feedback provided to the organization using the knowledge. KM and OM are the processes used to identify and capture critical knowledge. Knowledge workers and their organizations "do" KM; they identify key knowledge artifacts for retention and establish processes for capturing it. OM is what IT support organizations "do"; they provide the infrastructure and support for storing, searching, and retrieving knowledge artifacts. Figure 83.1 illustrates these relationships and the following sections expand on these concepts.

Jennex (2005b, page iv) defined KM as the practice of selectively applying knowledge from previous experiences of decision making to current and future decision-making activities with the express purpose of improving the organization's effectiveness. Also, Jennex viewed a KMS as that system created to facilitate the capture, storage, retrieval, transfer, and reuse of knowledge. The perception of KM and KMS is that they holistically combine organizational and technical solutions to achieve the goals of knowledge retention and reuse to ultimately improve organizational and individual decision making. This is a Churchman (1979) view of KM that allows KMS to take whatever form necessary to accomplish these goals. Another key definition of KM includes Holsapple and Joshi (2004), who considered KM as an entity's systematic and deliberate efforts to expand, cultivate, and apply available knowledge in ways that add value to the entity, in the sense of positive results in accomplishing its objectives or fulfilling its purpose. Finally, Alavi and Leidner (2001) concluded that KM involves distinct but interdependent processes of knowledge creation, knowledge storage and retrieval, knowledge transfer, and knowledge application.

Organizational Learning

OL is defined as a quantifiable improvement in activities, increased available knowledge for decision making, or sustainable competitive advantage (Cavaleri, 1994;

Dodgson, 1993; Easterby-Smith, 1997; Miller, 1996). In this view, organizations learn through individuals acting as agents for them. Individual learning activities are seen as being facilitated or inhibited by an ecological system of factors that may be called an OL system. Learning in this perspective is based on Kolb's (1984) model of experiential learning where individuals learn by doing. Huber, Davenport, and King (1998) believed an organization learns if, through its processing of information, its potential behaviors are changed. Huysman, Fischer, and Heng (1994) as well as Walsh and Ungson (1991) believed organizational learning has OM as a component. In this view, OL is the process by which experience is used to modify current and future actions. Huber



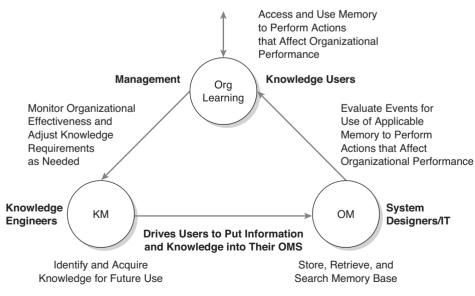


Figure 83.1 The KM/OM/OL Model SOURCE: Jennex, Croasdell, Olfman, and Morrison, 2005; Copyrighted by IGIGlobal. Reprinted by permission of the publisher.

(1991) considered four constructs as integrally linked to OL: knowledge acquisition, information distribution, information interpretation, and organizational memory. In this case, OM is the repository of knowledge and information acquired by the organization. OL uses OM as its knowledge base.

A different perspective on OL from Sandoe et al. (1998) is that organizations do not learn; rather, only individuals learn. During work, people gain experience, observe, and reflect in making sense of what they are doing. As they analyze these experiences into general abstractions, their perceptions on how work should be done changes. As these individuals influence their coworkers, the "organization" learns and the process is gradually changed. Learning in this perspective is also based on Kolb's (1984) model of experiential learning.

Organizational Memory

Stein and Zwass (1995) defined OM as the means by which knowledge from the past is brought to bear on present activities resulting in higher or lower levels of organizational effectiveness. Walsh and Ungson (1991) defined OM as stored information from an organization's history that can be brought to bear on present decisions. OM, like knowledge, can be viewed as abstract or concrete. It is comprised of unstructured concepts and information that exist in the organization's culture and the minds of its members, and it can be partially represented by concrete/physical memory aids such as databases. It is also comprised of structured concepts and information that can be exactly represented by computerized records and files. Sandoe and Olfman (1992) and Morrison (1997) described these two forms of OM as having two functions: representation and interpretation. Representation presents just the facts (or knowledge or expertise) for a given context or situation. Interpretation promotes adaptation and learning by providing frames of reference, procedures, guidelines, or a means to synthesize past information for application to new situations. Comparing to the definition of knowledge, it is obvious that knowledge and OM are related through experience and learning. We consider knowledge to be a subset of OM and the processes of KM a subset of OM processes.

KNOWLEDGE MANAGEMENT SYSTEMS

Alavi and Leidner (2001) defined KMS as "IT (Information Technology)-based systems developed to support and enhance the organizational processes of knowledge creation, storage/retrieval, transfer, and application" (p. 114). They observed that not all KM initiatives will implement an IT solution, but they supported IT as an enabler of KM. Maier (2002) expanded on the IT concept for the KMS by calling it an ICT (information and communication technology) system that supported the functions of knowledge creation, construction, identification, capturing, acquisition, selec-

tion, valuation, organization, linking, structuring, formalization, visualization, distribution, retention, maintenance, refinement, evolution, accessing, search, and application. Stein and Zwass (1995) defined an organizational memory information system (OMS) as the processes and IT components necessary to capture, store, and apply knowledge created in the past on decisions currently being made. Jennex and Olfman (2006) expanded this definition by incorporating the OMS into the KMS and adding strategy and service components to the KMS.

KMS CLASSIFICATIONS

There are different ways of classifying a KMS and/or KMS technologies where KMS technologies are the specific IT/ ICT tools being implemented in the KMS. Alavi and Leidner (2001) classified the KMS based on the knowledge life cycle stage being predominantly supported. Marwick (2001) classified the KMS by the mode of Nonaka's (1994) SECI model being implemented. Borghoff and Pareschi (1998) classified the KMS based on the class of the KM architecture being supported. This architecture has four classes of components: repositories and libraries, knowledge worker communities, knowledge cartography/mapping, and knowledge flows. Hahn and Subramani (2001) classified the KMS by the source of the knowledge being supported: structured artifact, structured individual, unstructured artifact, or unstructured individual. Binney (2001) classified the KMS using the knowledge spectrum. The knowledge spectrum represents the ranges of purposes a KMS can have. Zack (1999) classified a KMS as either integrative or interactive. Integrative KMS support the transfer of explicit knowledge using some form of repository and support. Interactive KMS support the transfer of tacit knowledge by facilitating communication between the knowledge source and the knowledge user. Jennex and Olfman classified the KMS by the type of users being supported. Users are separated into two groups based on the amount of common understanding they have with each other resulting in classifications of process-/task-based KMS for groups that have a common understanding and a generic/infrastructure KMS for groups that do not share a common understanding. An example of a group with a common understanding is a community of practice (CoP), which is a set of people who share a concern, a set of problems, or a passion about a topic (Wenger, McDermott, & Snyder, 2002).

KNOWLEDGE REPOSITORIES

Key to the KMS is knowledge repositories. Three types of knowledge repositories are paper documents, computerbased documents/databases, and self-memories:

 Paper documents incorporate all hard-copy documents, and they are organizationwide and groupwide references that reside in central repositories such as a corporate library. Examples include reports, procedures, pictures, videotapes, audiocassettes, and technical standards.

- Computer-based documents/databases include all computer-based information that is maintained at the work group level or beyond. These may be made available through downloads to individual workstations or may reside in central databases or file systems. Additionally, computer documents include the processes and protocols built into the information systems. These are reflected in the interface between the system and the user, by who has access to the data, and by the formats of structured system inputs and outputs. New aspects of this type of repository are digital images and audio recordings. These forms of knowledge provide rich detail but require expanded storage and transmission capacities.
- Self-memory includes all paper and computer documents that are maintained by an individual as well as the individual's memories and experiences. Typical artifacts include files, notebooks, written and unwritten recollections, and other archives. These typically do not have an official basis or format. Self-memory is determined by what is important to each person and reflects his or her experience with the organization.

Repositories have overlapping information and knowledge. Paper documents are indexed or copied into computer databases or files, self-memory uses paper and computer-based documents/databases, and computer databases or files are printed and filed. Spheres for self-memory and others' memory reflect that organizations consist of many individuals, and that the knowledge base contains multiple self-memories. Finally, the relative size of each sphere depends on the nature of the organization. Organizations that are highly automated and/or computerized would be expected to have a greater dependence on computer-based repositories while other organizations may rely more on paper or self-memory based repositories.

Use of Knowledge Repositories

Should organizations focus more on computerized repositories or on self-memory repositories? Computerized repositories provide a measure of permanence coupled with better tools for searching and retrieving knowledge. However, organizations should consider the transience and experience level of their workers when selecting repositories. Sandoe and Olfman (1992) found that the increasing transience of organizational workers requires a shift in the location of knowledge. Organizations that have large numbers of transient workers are at risk of losing knowledge if it is allowed to remain in self-memories. These organizations need to capture and store knowledge in more concrete forms such as paper or computer-based repositories. They also suggested that stronger attempts should be made to capture the unstructured, abstract information and knowledge in concrete forms. Additionally, Jennex and Olfman (2002) found that new organizational workers have trouble using the document and computer-based repositories and rely on the self-memories of longer term members. This continues until the new member gains sufficient context and culture to understand and use the information and knowledge in the paper and computer-based repositories. While these guidelines are contradictory because transient organizations will tend to have more new members, they emphasize that organizations should minimize reliance on self-memories for the retention of concrete, structured knowledge while using self-memories as the mechanism for teaching organizational culture and passing on unstructured, abstract knowledge.

KM/KMS SUCCESS

Jennex, Smolnik, and Croasdell (2007) found KM success to be a multidimensional concept defined by capturing the right knowledge, getting the right knowledge to the right user, and using this knowledge to improve organizational and/or individual performance. KM success is measured using the dimensions of impact on business processes, strategy, leadership, efficiency and effectiveness of KM processes, efficiency and effectiveness of the KM system, organizational culture, and knowledge content. KM success is considered the same as KM effectiveness and KM success is equated to KMS success when the Churchman (1979) view of a KMS is used.

While these measures are useful for measuring success, it is also important to understand what is needed to have successful KM/KMS. Jennex and Olfman (2005) summarized and synthesized the literature from 17 studies on over 200 KM projects about KM/KMS critical success factors (CSFs) into an ordered set of 12 KM CSFs. The following 12 CSFs were ordered based on the number of studies identifying the CSF:

- A knowledge strategy that identifies users, sources, processes, storage strategy, knowledge, and links to knowledge
- Motivation and commitment of users including incentives and training
- Integrated technical infrastructure including networks, databases/repositories, computers, software, and experts
- An organizational culture and structure that supports learning and the sharing and use of knowledge
- A common enterprisewide knowledge structure that is clearly articulated and easily understood
- Senior management support including allocation of resources, leadership, and providing training
- · Learning organization
- · A clear goal and purpose for the KMS
- Measures established to assess the impacts of the KMS and the use of knowledge as well as verifying that the right knowledge is being captured
- The search, retrieval, and visualization functions of the KMS support easy knowledge use

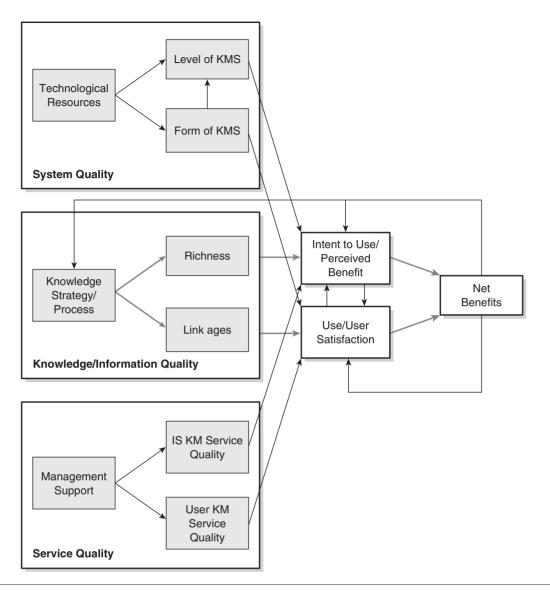


Figure 83.2 Jennex and Olfman's (2006) KM Success Model SOURCE: Copyrighted by IGIGlobal. Reprinted by permission of the publisher.

- Work processes are designed that incorporate knowledge capture and use
- · Security/protection of knowledge

While it is useful to identify the KM CSFs, it is more useful to express the CSFs in a model that relates them to KM success. Jennex and Olfman's (2006) KM success model (Figure 83.2) is a causal model that relates KM CSFs to KM success. It has three basic dimensions as antecedents to KM success: system quality, which deals with the technical infrastructure; knowledge/information quality, which deals with KM strategy for identifying critical knowledge and then how that knowledge is stored; and service quality, which deals with management support and allocation of resources. The model also has the dimensions of perceived benefit, user satisfaction, and net benefits. These dimensions deal with ensuring that the KM initiative meets the needs of the users and the organization.

EXAMPLES OF KMS

Internet-Based KMS

One of the most commonly cited KMS success factors (Jennex & Olfman, 2005) is having an integrated technical infrastructure including networks, databases/repositories, computers, software, and KMS experts. KM designers are using the Internet to obtain this integrated network and are using browsers as common software. Various approaches are being utilized by KMS designers to achieve common databases and repositories. Common taxonomies and ontologies are being used to organize storage of unstructured knowledge files and to facilitate knowledge retrieval while other Internet-based KMS serve as interfaces to large enterprise databases or data warehouses. Some Internet KMS are being used to facilitate communication and knowledge transfer between groups. Knowledge portals are being used

by organizations to push knowledge to workers and by CoP to facilitate communication and to share knowledge between community members. The following section describes some examples of Internet-based KMS.

Internet networks can be scaled to fit any size KMS. Browsers can be tailored to fit processes as desired. Taxonomies can be created that support unstructured knowledge sharing for any size KMS. The following examples illustrate this flexibility as the examples include a project KMS, an industrywide project KMS, and enterprise KMS. Knowledge portals can be scaled to fit either form of KMS but are more commonly used for enterprise KMS. CoP KMS is a variation of process/task KMS.

Examples of Internet-Based KMS

Project-Based KMS for a Single Organization

Jennex (2000) discussed an intranet-based KMS used to manage knowledge for a virtual Y2K project team. This KMS used two different site designs over the life of the project. The purpose of the initial site was to facilitate project formation by generating awareness and providing basic information on issues the project was designed to solve. The design of this site was based on Jennex and Olfman (2002), which suggested a structure providing linkages to expertise and lessons learned were the knowledge needed by knowledge workers. This was accomplished by providing hot links to sites that contained Y2K knowledge, a project team roster that indicated the areas of expertise for each of the project team members, additional entries for individuals with expertise important to the project, and some basic answers to frequently asked questions (FAQs). The site did not contain guidelines and accumulated knowledge as reflected in test plans, test results, inventories of assets referenced to the division who owned them, and general project knowledge such as project performance data, meeting minutes and decisions, presentations, and other project documentation. This information had not been generated at the time the site was implemented. Once generated, this information was stored on network servers with shared access to acknowledged project team members.

As the project team formed and began to perform its tasks, the requirements for the intranet site changed from generating awareness to supporting knowledge sharing. The site was redesigned and expanded to include detailed FAQs, example documents, templates, meeting minutes, an asset database, guidelines for specific functions that included lessons learned, and so forth. The knowledge content of the site was distributed into the other components of the site and persons were identified as being responsible for the information and knowledge content of their responsible areas. Additionally, access to the site was enhanced by the addition of a hot link to the Y2K site placed and prominently displayed on the corporate intranet home page. The basic layout of the site provided for access to seven specific

subsites: major initiatives, contacts, documents, what's new, hot links, issues and questions, and Y2K MIS.

The effectiveness of the two sites was considered good. The first site was successful in generating interest and starting the project. The second site succeeded in taking a project that was performing in the bottom one third of projects to being a leading project within 6 months after its release. Effectiveness of the sites was established using the model in Figure 83.2 and by ensuring that the information quality was high and that the system quality, especially the search, retrieval, and infrastructure, was good.

KMS as a Knowledge Portal

This example from Cross and Baird (2000) is an intranet site built by Andersen Consulting. Consulting firms have had a long tradition of brokering their knowledge into business. In the early 1990s, Andersen Consulting began to produce global best practices CDs for distribution to project personnel. This evolved into the development of an intranet site called KnowledgeSpace that provided consultants with various forms of knowledge including methodologies, tools, best practices, reports from previous like engagements, and marketing presentations. Support was also provided for online communications for online communities of practice and virtual project teams. The site was effective for personnel with access to the Internet and adequate bandwidth. It should be noted that current modem technology and improved dial-in access, as well as the proliferation of broadband connections, have made sites such as this much more effective for field or remote personnel.

The second example, from Bartczak and England (2005), describes the system used by the United States Air Force to support the Material Command, called the AFKM Hub. The AFKM (Air Force knowledge management) Hub is the primary Web site for the Air Force Lessons Learned utility. Although the Web site has evolved, Lessons Learned is still the centerpiece of the Hub. Lessons Learned have been captured and categorized by subject area and provide valuable knowledge about past processes and events. The AFKM Hub also acts as a portal for all other AFKM components and serves as the default AFKM home page. The AFKM Hub provides a conduit to select relevant information and knowledge resources and provides an avenue for creating a knowledge-sharing organization. The Air Force Material Command (AFMC) Help Center of the AFKM Hub allows AFMC customers to perform a natural language or keyword search of over 130 AFMC Web sites and selected databases. It connects AFMC customers throughout the Air Force and Department of Defense with the appropriate AFMC information source or point of contact. The CoP work space supports the growing number of Air Force CoPs. CoP work spaces are virtual environments where members can exchange information to complete work tasks and solve problems. Each CoP serves a specific customer set. The AFKM Hub provides work spaces for a variety of CoPs and supports over 1,300 active CoPs. The effectiveness of the AFKM Hub has also been mixed. Air Force leadership sees the value in KM and many examples of successful uses of knowledge have been recorded. However, articulating a knowledge and KM strategy has been difficult and has allowed for wasted effort in supporting AFKM needs.

KMS as a Topic Map

The last examples come from Eppler (2001). There are five types of knowledge maps: source, asset, structure, application, and development. A multimedia company intranet site is used to illustrate a knowledge source map. This site provides graphical buttons representing individuals with specific expertise color coded to indicate the expert's office location. The knowledge asset map provides a visual balance sheet of an organization's capabilities of a skills directory or core competency tree. Colors are used to indicate knowledge domains while the size of symbols indicates level of expertise. The knowledge structure map divides knowledge domains into logical blocks that are then broken into specific knowledge areas. The knowledge application map breaks an organization's value chain into its components parts and then indicates what knowledge, tools, or techniques are needed to implement the component part. The last example is a knowledge development map. This map is used to plot the activities needed to acquire the indicated knowledge competence. Clicking on the displayed competence displays the steps needed to develop the competence. Effectiveness of these maps has only been determined for the knowledge asset map. This map, developed for a telecommunications consultant firm, was found to be very useful for the planning of training activities and for identifying experts quickly when required during an emergency. IT should be noted that knowledge maps enhance the linkage aspects of information quality.

Enterprise System Support for KMS

As organizations strive to improve their competitive position/advantage, they are implementing enterprise wide systems. These systems integrate processes and data/information/knowledge across the enterprise and in many cases with suppliers and customers to improve efficiency and effectiveness (Koch, 2002). This usually results in lowered operating costs and improved response times, economies of scale, and user satisfaction. Typical of these systems are enterprise resource planning (ERP), customer relationship management (CRM), supply chain management (SCM), and data warehouse implementations. As these systems are refined and improved, organizations are finding that incorporating knowledge and KM improves system performance. Unfortunately, several issues are also involved in successfully using enterprise systems to support KM; chief among these are organizational culture issues. Many enterprises suffer from fragmentation, meaning that many

organizations within the enterprise own and use their own data and systems. Enterprise systems seek to integrate these systems but to be successful they must overcome issues of ownership and a reluctance to share data, information, and knowledge. This issue is usually characterized by the presence of "silos" in the enterprise. Corral, Griffen, and Jennex (2005) discussed this issue with respect to integrating data warehouses and KM. The following examples describe how enterprise systems and KMS are being fused together.

ERP and KMS

Li, Yezhuang, and Ping (2005) described an ERP implementation in a Chinese paper manufacturing company. The ERP was implemented to help the company respond to market and customer changes more rapidly by integrating enterprise data information and knowledge and by centralizing process control. Unfortunately, China lacked experience with ERP implementation and was not overly familiar with Western concepts of centralized data, information, and knowledge management. This was an issue in getting the ERP implemented and utilized. Once this was accomplished, decision making was greatly enhanced through improved knowledge transfer provided by the ERP's integration of organizational data, information, and knowledge into a single accessible location. Other issues faced in implementing the ERP was management support for the various suborganizations being integrated into the ERP and creating a culture that used data, information, and knowledge in the expected way.

White and Croasdell (2005) described ERP implementations in Nestle, Colgate-Palmolive, and Chevron-Texaco. Each of these implementations was performed to improve data, information, and knowledge integration with an expectation of improved decision making and transfer of key knowledge such as lessons learned and process improvements. All three implementations were ultimately successful after initial difficulties including cost overruns due to unrealistic project estimates of schedule and cost and overcoming employee resistance to changing to new processes and merging data, information, and knowledge ownership. These examples also incorporated the KMS success factor of metrics for measuring success, and they illustrate the importance of measuring KMS performance.

CRM and KMS

Al-Shammari (2005) described a knowledge-enabled customer relationship management (KCRM) system in a large Middle Eastern telecommunications company. The KCRM was composed of three major parts: enterprise data warehouse (EDW), operational CRM, and analytical CRM. The KCRM initiative was designed to automate and streamline business processes across sales, service, and fulfillment channels. The KCRM initiative was targeted at achieving an integrated view of customers, maintaining long-term customer

relationships, and enabling a more customer-centric and efficient go-to-market strategy. The driver for the initiative was that the company faced deregulation after many years of monopoly. The company initiated a customer-centric KM program and pursued understanding customers' needs and forming relationships with customers, instead of only pushing products and services to the market. Unfortunately, the KCRM program ended as an ICT project. The company did not succeed in implementing KCRM as a business strategy, but it did succeed in implementing the KCRM as a transactional processing system. Several challenges and problems were faced during and after the implementation phase. Notable among these is that the CRM project complexity and responsibilities were underestimated, and as a result, the operational CRM solution was not mature enough to automate CRM processes effectively and efficiently. Changing organizational culture was also a tremendous effort in terms of moving toward customer-centric strategy, policy, and procedures, as well as sharing of knowledge in a big organization with lots of business silos. Employee resistance to change posed a great challenge to the project. Ultimately, this project failed to achieve to expectations.

Data Warehouse, Enterprise Databases, and KMS

White and Croasdell (2005) described Xerox's use of an enterprise database to facilitate the sharing of experience knowledge across the company. Xerox's had difficulty in fostering best practice among its group of printer maintenance employees. The problem centered on an inability to circulate employee expertise using existing organizational infrastructure. To help the maintenance technicians share their experience and expertise, Xerox created a database to hold top repair ideas in order to share those ideas with other technicians in all areas. This strategy called for only the most favored ideas to be kept within the database as it often occurred that what one person thought useful others found absurd or redundant. Xerox also realized that many databases had been created by managers who filled the databases with information they thought would be useful for their employees. However, most of those databases were rarely used by the employees. When Xerox created the Eureka database, it also formed a process for entering and updating the ideas within the database. The process is based on a peer-review system. Within this practice the representatives, not the organization, supply and evaluate tips. In this way, a local expert would work with the representative to refine the tip. Representatives and engineers evaluate the tips, calling in experts where appropriate. As of July 2000, the Eureka database held nearly 30,000 ideas and it was being utilized by 15,000 Xerox technicians who answered one quarter of one million repair calls per year. The shared knowledge in Eureka saved Xerox about \$11 million in 2000, and customers also saved money in terms of the reduction in downtime.

Eureka later extended the role of the Eureka Database to collect, share, and reuse solutions to software and network problems as well as those involving hardware.

ADVANCED TECHNOLOGIES

Although there is strong support for using the Internet as a knowledge infrastructure, there are concerns. Chief among these concerns is the difficulty in organizing, searching, and retrieving unstructured knowledge artifacts. Ezingeard, Leigh, and Chandler-Wilde (2000) pointed out that Ernst & Young U.K., in the beginning of 2000, had in excess of one million documents in its KMS. Another concern is the tendency to not to use the system. Cross and Baird (2000) discussed this tendency but came to the conclusion that repositories are essential. Jennex (2005a) found that use and importance for knowledge do not correlate, suggesting that use is not a true measure of the value of a KMS. Jennex and Olfman (2002) found that voluntary use is enhanced if the system provides near and long-term job benefits, voluntary use is not too complex, and the organization's culture supports sharing and using knowledge and the system. Stenmark (2002) found that if the Internet is visualized as a system for increasing awareness of knowledge and the KMS, a system for retaining and sharing knowledge, and as a system for enhancing communication and collaboration between teams and knowledge experts and users; then, it should be successful as a KMS. In all cases, researchers are experimenting with technologies that improve the handling of unstructured knowledge. These are discussed in the following paragraphs.

Newman and Conrad (2000) proposed a framework for characterizing KM methods, practices, and technologies. This framework looks at how tools can impact the flow of knowledge within an organization, IT's role in manipulating knowledge artifacts, and the organizational behavior most likely to be affected. The framework also looks at the part of the KM process the tool works in. The activity phase looks at the utilization, transfer, retention, and creation of knowledge. This framework can be used to show that Internet- and browser-based KMS tools are effective.

Gandon, Dieng, Corby, and Giboin (2000) proposed using XML to encode memory and knowledge and suggested using a multiagent system that can exploit this technology. The proposed system would have improved search capabilities and would improve the disorganization and poor search capability normally associated with Internet systems. Chamberlin et al. (2001) and Robie, Lapp, and Schach (1998) discussed using XML query language to search and retrieve XML encoded documents.

Dunlop (2000) proposed using clustering techniques to group people around critical knowledge links. As individual links go dead due to people leaving the organization, the clustered links will provide a linkage to people who are familiar with the knowledge of the departed employee. This technique would improve the reliability of the links to knowledge called for in Figure 83.2. Lindgren (2002) proposed the use of Competence Visualizer to track skills and competencies of teams and organizations.

Te'eni and Feldman (2001) proposed using task-adapted Web sites to facilitate searches. This approach requires the

site be used specifically for a KMS. Research has shown that some tailored sites such as ones dedicated to products or communities have been highly effective. This approach is incorporated in the examples in this paper with the exception of the use of dynamic adaptation.

Eppler (2001), Smolnik and Nastansky (2002), and Abramowicz, Kowalkiewicz, and Zawadzki (2002) discussed the use of knowledge maps to graphically display knowledge architecture. This technique uses an intranet hypertext clickable map to display visually the architecture of a knowledge domain. Knowledge maps are also known as "topic maps" and "skill maps." Knowledge maps are useful as they create an easy to use standard graphical interface for the intranet users and an easily understandable directory to the knowledge.

The use of ontologies and taxonomies to classify and organize knowledge domains is growing. Zhou, Booker, and Zhang (2002) proposed the use of Rapid Ontology Development (ROD) as a means of developing an ontology for an undeveloped knowledge domain.

Making sense of seemingly unrelated structured data, information, and knowledge can also be difficult. Data mining is being used as a method for identifying patterns in this data, information, and knowledge that can then be assessed for meaning. Zaima and Kashner (2003) described data mining as an iterative process that uses algorithms to find statistically significant patterns in structured data, information, and knowledge. These patterns are then analyzed by business process experts to determine if they actually have meaning in the business process context. CRM tends to use this technology the most as illustrated by the example from Al-Shammari (2005).

Organizing and visualizing data and information into usable knowledge is a challenge that digital dashboard technologies are seeking to solve. Few (2005) described dashboards as providing single screen summaries of critical data and information. Key to developing effective dashboards is the use of KM to identify critical knowledge for key decision making and then linking it to the appropriate context data and information that indicates the status of the key knowledge. Dashboards can be used with an Internet browser or any other KMS infrastructure.

CONCLUSION

KM is a vital discipline. It aids organizations in utilizing the knowledge of its members and in building organizational knowledge. KM has an impact on organizational performance. Organizations that utilize their knowledge well tend to perform better and are more successful.

REFERENCES AND FURTHER READINGS

Abramowicz, W., Kowalkiewicz, M., & Zawadzki, P. (2002). Tell me what you know or I'll tell you what you know: Skill

- map ontology for information technology courseware. In M. Khosrowpour (Ed.), *Issues and trends of information technology management in contemporary organizations:* 2002 *Information Resources Management Association International Conference, Seattle, Washington, USA, May 19–22, 2002* (Vol. 1, pp. 1–10). Hershey, PA: Idea Group Publishing.
- Al-Shammari, M. (2005). Implementing knowledge-enabled CRM strategy in a large company: A case study from a developing country. In M. E. Jennex (Ed.), *Case studies in knowledge management* (pp. 249–278). Hershey, PA: Idea Group Publishing.
- Alavi, M., & Leidner, D. E. (2001). Review: Knowledge management and knowledge management systems: Conceptual foundations and research issues. *MIS Quarterly*, 25(1), 107–136.
- American heritage dictionary of the English language (4th ed.). (2003). Boston: Houghton Mifflin.
- Bartczak, S. E., & England, E. C. (2005). Challenges in developing a knowledge management strategy for the air force material command. In M. E. Jennex (Ed.), Case studies in knowledge management (pp. 104–128). Hershey, PA: Idea Group Publishing.
- Binney, D. (2001). The knowledge management spectrum: Understanding the KM landscape. *The Journal of Knowledge Management*, 5(1), 33–42.
- Borghoff, U. M., & Pareschi, R. (1998). Information technology for knowledge management. Berlin, Germany: Springer-Verlag.
- Cavaleri, S. (1994). Soft systems thinking: A pre-condition for organizational learning. *Human Systems Management*, 13(4), 259–267.
- Chamberlin, D., Clark, J., Florescu, D., Simon, J., Robie, J., & Stofancscu, M. (2001). Xquery 1.0: An XML query language. Retrieved September 12, 2007, from http://www.w3.org/TR/xquery/
- Churchman, C. W. (1979). *The systems approach*. New York: Dell Publishing.
- Corral, K., Griffin, J., & Jennex, M. E. (2005). Expert's perspective: The potential of knowledge management in data warehousing. *Business Intelligence Journal*, 10(1), 36–40.
- Cross, R., & Baird, L. (2000). Technology is not enough: Improving performance by building organizational memory. *Sloan Management Review*, 41(3), 41–54.
- Davenport, T. H., & Prusak, L. (1998). Working knowledge. Boston: Harvard Business School Press.
- Degler, D., & Battle, L. (2000). Knowledge management in pursuit of performance: The challenge of context. *Performance Improvement*, *ISPI*, *39*(6). Retrieved September 12, 2007, from http://www.ipgems.com/writing/kmcontext.htm
- Dodgson, M. (1993). Organizational learning: A review of some literatures. *Organization studies*, *14*(3), 375–394.
- Dunlop, M. D. (2000, October 30). Development and evaluation of clustering techniques for finding people. Paper presented at the Third International Conference, Basel, Switzerland.
- Easterby-Smith, M. (1997). Disciplines of organizational learning: Contributions and critiques. *Human Relations*, 50(9), 1085–1113.
- Eppler, M. J. (2001, January 3–6). Making knowledge visible through intranet knowledge maps: Concepts, elements, cases. In R.H. Sprague (Ed.), *Proceedings of the 34th Annual Hawaii International Conference on System Sciences: Maui, Hawaii*. Los Alamitos, CA: IEEE Computer Society Press.

- Ezingeard, J.-N., Leigh, S., & Chandler-Wilde, R. (2000). Knowledge management at Ernst & Young UK: Getting value through knowledge flows. *Teaching Case*. 807–822.
- Few, S. (2005). Dashboard design: Beyond meters, gauges, and traffic lights. *Business Intelligence Journal*, 10(1), 18–24.
- Gandon, F., Dieng, R., Corby, O., & Giboin, A. (2000). A multiagent system to support exploiting an XML-based corporate memory. In U. Reimer (Ed.): PAKM2000: practical aspects of knowledge management: proceedings of the Third International Conference, Basel, Switzerland, October 30–31, 2000. Retrieved September 12, 2007, from http://sunsite.informatik.rwth-aachen.de/Publications/CEUR-WS/Vol-34/gandon_et_al.pdf
- Hahn, J., & Subramani, M. R. (2000). A framework of knowledge management systems: Issues and challenges for theory and practice. Proceedings of the Twenty-first International Conference on Information Systems, Association for Information Systems, 302–312.
- Hofstede, G. H. (1980). *Culture's consequences*. Thousand Oaks, CA: Sage.
- Hofstede, G. H. (2001). *Culture's consequences: Comparing values, behaviors, institutions, and organizations across nations.*Thousand Oaks, CA: Sage.
- Holsapple, C. W., & Joshi, K. (2004). A formal knowledge management ontology: Conduct, activities, resources, and influences. *Journal of the American Society for Information Science and Technology*, 55(7), 593–612.
- Huber, G. P. (1991). Organizational learning: The contributing processes and the literatures. *Organization Science*, 2(1), 88–115.
- Huber, G. P., Davenport, T. H., & King, D. (1998). Some perspectives on organizational memory. Paper presented at the 31st Annual Hawaii International Conference on System Sciences, Hawaii.
- Huysman, M. H., Fischer, S. J., & Heng, M. S. H. (1994). An organizational learning perspective on information systems planning. *Journal of Strategic Information Systems*, 3(3), 165–177.
- Jennex, M. E. (2000). Using an intranet to manage knowledge for a virtual project team: Internet-based organizational memory and knowledge management. Hershey, PA: Idea Group Publishing.
- Jennex, M. E. (2005a). The issue of system use in knowledge management systems. In *Proceedings of the 38th Hawaii International Conference on System Sciences (HICSS38)* (Vol. 8, p. 253–261). Washington, DC: IEEE Computer Society. Retrieved September 12, 2007, from http://csdl2.computer.org/comp/proceedings/hicss/2005/2268/08/22680253c.pdf
- Jennex, M. E. (2005b). What is KM? *International Journal of Knowledge Management, 1*(4), iv.
- Jennex, M. E. (2006, January). Classifying knowledge management systems based on context content. In *Proceedings of the Hawaii International Conference on Systems Sciences* (Vol. 7, p. 156b). Washington, DC: IEEE Computer Society.
- Jennex, M. E., & Olfman, L. (2001). Development recommendations for knowledge management/organizational memory systems. In Sein et al. (Eds.), Contemporary trends in IS development (pp. 209–222). Norwell, MA: Kluwer Academic.
- Jennex, M. E., & Olfman, L. (2002). Organizational memory/ knowledge effects on productivity: A longitudinal study. In Proceedings of the 35th Hawaii International Conference on System Sciences (HICSS35). Washington, DC: IEEE Computer Society. Retrieved September 12, 2007, from http://

- csdl2.computer.org/comp/proceedings/hicss/2002/1435/04/14350109b.pdf
- Jennex, M. E., & Olfman, L. (2005). Assessing knowledge management success. *International Journal of Knowledge Management*, 1(2), 33–49.
- Jennex, M. E., & Olfman, L. (2006). A model of knowledge management success. *International Journal of Knowledge Management*, 2(3), 51–68.
- Jennex, M. E., Croasdell, D., Olfman, L., & Morrison, J. (2005). Knowledge management, organizational memory, and organizational learning at the Hawaii international conference on system sciences. *International Journal of Knowledge Management*, 1(1), 1–7.
- Jennex, M. E., Smolnik, S., & Croasdell, D. (2007). Exploring knowledge management success. Paper presented at the 40th Hawaii International Conference on System Sciences (HICSS40). Retrieved September 12, 2007, from http://csdl2.computer.org/comp/proceedings/hicss/2007/2755/00/27550193c.pdf
- Koch, C. (2002). ABC: An introduction to ERP web page. Retrieved September 9, 2007, from http://www.cio.com/research/erp/edit/erpbasics.html
- Kolb, D. (1984). Experimental learning. Upper Saddle River, NJ: Prentice-Hall.
- Li, Z., Yezhuang, T., & Ping, L. (2005). Organizational knowledge sharing based on the ERP implementation of Yongxin paper company, limited. In M. E. Jennex (Ed.), Case studies in knowledge management (pp. 156–164). Hershey, PA: Idea Group Publishing.
- Lindgren, R. (2002). Competence visualizer: Generating competence patterns of organizational groups. In *Proceedings of the 35th Annual Hawaii International Conference on System Sciences (HICSS'02)* (Vol. 4, p. 108).
- Maier, R. (2002). Knowledge management systems: Information and communication technologies for knowledge management. Berlin, Germany: Springer-Verlag.
- Marwick, A. D. (2001). Knowledge management technology. *IBM Systems Journal*, 40(4), 814–830.
- Miller, D. (1996). A preliminary typology of organizational learning: Synthesizing the literature. *Journal of Management*, 22(3), 485–505.
- Morrison, J. (1997). Organizational memory information systems: Characteristics and development strategies. In *Proceedings* of the Thirtieth Annual Hawaii International Conference on System Sciences, (Vol. 2, p. 300). Washington, DC: IEEE Computer Society Press.
- Newman, B., & Conrad, K. (2000). A framework for characterizing knowledge management methods, practices, and technologies. In *Proceedings of the Third International Conference on Practical Aspects of Knowledge Management*, PAKM2000. Retrieved September 12, 2007, from http://revolution.3-cities .com/~bonewman/newman_conrad%20PAKM2000-16.pdf
- Nonaka, I. (1994). A dynamic theory of organizational knowledge creation. *Organization Science*, *5*(1), 14–37.
- Nonaka, I., & Takeuchi, H. (1995). *The knowledge-creating company—How Japanese companies create the dynamics of innovation*. Oxford, UK: Oxford University Press.
- Polanyi, M. (1967). The tacit dimension. London: Routledge.
- Robie, J., Lapp, J., & Schach, D. (1998). XML query language (XQL). WWW The Query Language Workshop (QL). Retrieved September 12, 2007, from http://www.w3.org/TandS/QL/QL98/pp/xql.html

- Sandoe, K., Croasdell, D. T., Courtney, J., Paradice, D., Brooks, J., & Olfman, L. (1998). Additional perspectives on organizational memory. Unpublished working paper for the task force on organizational memory. In F. Burstein, G. Huber, M. Mandviwalla, J. Morrison, & L. Olfman (Eds.), Proceedings of the 31st Annual Hawaii International Conference on System Sciences, Hawaii.
- Sandoe, K., & Olfman, L. (1992). Anticipating the mnemonic shift: Organizational remembering and forgetting in 2001. In Proceedings of the Thirteenth International Conference on Information Systems (pp. 127–137). Dallas, TX: ACM Press.
- Smolnik, S., & Nastansky, L. (2002, January). K-discovery: Using topic maps to identify distributed knowledge structures in groupware-based organizational memories. *Proceedings of* the 35th Annual Hawaii International Conference on System Sciences, IEEE Computer Society, 7(10), 966–975.
- Stein, E. W., & Zwass, V. (1995). Actualizing organizational memory with information systems. *Information Systems Research*, 6(2), 85–117.
- Stenmark, D. (2002). Information vs. knowledge: The role of intranets in knowledge management. In *Proceedings of the* 35th Annual Hawaii International Conference on System Sciences. IEEE Computer Society. Retrieved September 10, 2007, from http://www.viktoria.se/~dixi/publ/ddoml02.pdf
- Te'eni, D., & Feldman, R. (2001). Performance and satisfaction in adaptive Web sites: An experiment on searches within a

- task-adapted Web site. *Journal of the Association for Information Systems*, 2(3), 1–30. Retrieved September 9, 2007, from http://faculty.biu.ac.il/~teenid/publications/adaptweb4.pdf
- UNESCO universal declaration on cultural diversity. (2002).
 Retrieved September 9, 2007, from http://www.unesco.org/education/imld_2002/universal_decla.shtml
- Walsh, J. P., & Ungson, G. R. (1991). Organizational memory. *Academy of Management Review*, 16(1), 57–91.
- Wenger, E., McDermott, R., & Snyder, W. M. (2002). Cultivating communities of practice. Boston: Harvard Business School Press.
- White, C., & Croasdell, D. (2005). A comparative case study of knowledge resource utilization to model organizational learning. In M. E. Jennex (Ed.), *Case studies in knowledge management* (pp. 235–248). Hershey, PA: Idea Group Publishing.
- Zack, M. H. (1999). Managing codified knowledge. *Sloan Management Review*, 40(4), 45–58.
- Zaima, A., & Kashner, J. (2003). A data mining primer for the data warehouse professional. *Business Intelligence Journal*, 8(2), 44–54.
- Zhou, L., Booker, Q. E., & Zhang, D. (2002). ROD—Toward rapid ontology development for underdeveloped domains. In *Proceedings of the 35th Annual Hawaii International Conference on System Sciences* (Vol. 4, p. 106) IEEE Computer Society.

FACILITATING MOBILE AND VIRTUAL WORK

MATTI A. VARTIAINEN

Helsinki University of Technology

The distribution and mobilization of activities in the corporate value chain has increased dramatically over the last decade and will continue to do so as these organizations seek to reduce costs, get closer to their customers, ally themselves with other companies, and engage the best talent, wherever it may be.

WORKING IN MULTIPLE PLACES

Two Examples: Global Sales Force and Local Maintenance Workers

A Global Sales Force

A sales force is marketing tailored product and system packages in developing countries. The manager has seven local workers and five others in China, Russia, Singapore, India, and the United States. The U.S. representative is responsible for activities in Africa. In addition, every 2 to 3 months an extended steering group, also including product managers, has its meeting. The meetings are supposed to be face-to-face, but often, customer appointments make this impossible, and virtual meetings and call conferences are used instead for communication and decision making.

Employees consider the distribution of their working locations, asynchronous ways of working, and the diversity of the people they meet to be the main complexity factors in their work (see Figure 84.1). They fly to their working destinations, passing through several time zones. Locally, they also use cars and trains. For example, one of the employees described his trips as follows:

I have around 80 travel days yearly. I often go to Latin America. Usually I go there twice a month, each trip lasting around one week. In addition I go to China, Indonesia, Russia, Thailand, and Vietnam.

We typically have trade shows where I meet local clients. Usually during a week I try to focus my work so that for example I visit four countries and cities during the same trip: Mexico, Brazil, Argentina, and Chile. A one-day visit to each to meet the local account team in the morning and to visit customers in the afternoon.

When traveling, they work in the company's local office, at customers' premises, in conference venues, and in hotels. The purpose of moving is twofold: first, to meet and cowork with their own local teams, and second, working with customers to promote product sales. Diverse actors such as media people, local politicians, researchers, and company people are met. This brings with it various cultural, religious, and individual influences on the ways and contents of communication. Working times are a challenge. For example, an employee may start to work at 3:00 a.m. local time in order to be able to have a joint call conference with colleagues in Europe. And while working at home, he may participate in a virtual meeting at 9:00 p.m. in order to have a joint meeting with American colleagues. The sales force is mainly occupied with temporary projects; when a task is fulfilled, a project ends and a new one starts. Employees consider face-to-face meetings important, especially for convincing customers. When traveling, sales force employees use electronic connections sparingly.

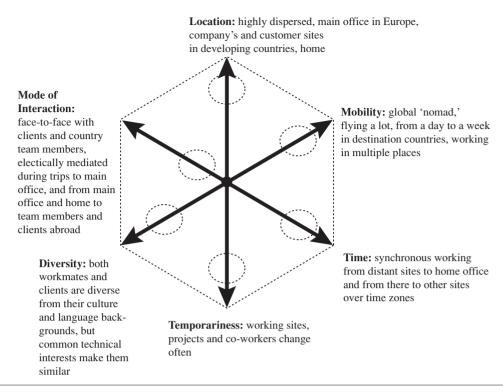


Figure 84.1 Global Sales Force's Complexity Factors SOURCE: Hyrkkänen and Vartiainen, 2005, p. 93.

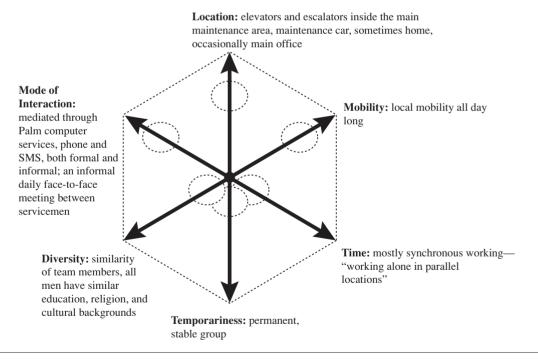


Figure 84.2 Mobile Maintenance Workers' Complexity Factors SOURCE: Verburg, Testa, Hyrkkänen, and Johansson, 2006, p. 278.

Mobile Maintenance Employees in a City

A large-scale engineering and facility management enterprise employs people globally, but its teams work locally. Workers are organized into groups of maintenance workers under one supervisor. In each city, there are several service districts, each with its own responsible supervisor. The service districts are further divided into maintenance areas, each with one maintenance employee. Maintenance work consists of the service tasks defined in the maintenance

contract, alarm situations demanding immediate response, and possible on-call and specified tasks (Figure 84.2).

The size of the maintenance area is some 20 to 30 square kilometers. The weekly round per employee is roughly 50 to 100 kilometers. The number of estates to be serviced varies from 150 to 250 per person. Their daily visits vary in number from 10 to 20, depending on how demanding the maintenance tasks are. Sometimes a whole day can be spent at one location. Each employee uses a transit van for transferring spare parts and maintenance equipment from one service location to another.

The maintenance employees receive their work orders and report the completed jobs via a palm computer. On receiving work orders, the employees themselves "commission" monthly service lists into the palm computer, while in acute situations the customer service center sends a message to it. Reporting on the job takes place immediately after the work, directly from the job location. Electronic work reports are the basis of the payroll and act as the basis for client invoices.

Collaboration between the employees and contact between the team members and their supervisor are maintained by telephone, by palm computer, and with text messages. The employee need not carry several tools with him. Service work also involves safety risks. Therefore, if the maintenance employee has not used the software application for one hour, the application sends an inquiry about the situation.

The employees drive directly from home to the service area, where they start work at 7:00 a.m. and work until 4:00 p.m., after which they drive straight home. Employees assist one another in tasks that cannot be completed alone, for instance, for reasons of safety. This adds to their jobs, as they need to move outside their maintenance areas. The factors affecting the time spent on the move are not only the number of kilometers driven but also the 2 or 3 hours wasted in traffic jams in the city.

The maintenance employees visit the main office perhaps once every 2 weeks, mostly to pick up equipment for the maintenance vehicle. Once every 2 months they have a team meeting. Usually during these visits, they also meet their supervisor, with whom they communicate daily over the telephone. Both the employer and the employees are content with this working mode.

Drivers of Mobile Virtual Work

The challenge of working in multiple places and while moving is not new; some spearhead companies faced up to it early and changed their workplace strategies and policies. However, Andriessen and Vartiainen (2006) remarked that the majority of companies are still grappling with how to deal with this growing phenomenon.

A number of driving forces enable us to understand why these types of work have rapidly gained momentum worldwide. Some of the driving forces are related to reducing costs and increasing economic outcomes. Others grow out of the needs and preferences of employees. The driving forces form an interwoven set of relationships. They can be clustered into (a) societal and economical forces such as competition in markets, (b) developments in technology, and (c) organizational and individual preferences and needs.

A major driving force is the fact that work has shifted from agricultural- and industry-based work to information- and knowledge-processing work. Many objects that are exchanged are digital "objects" that can be sent over large distances in seconds. Many other exchange processes refer to knowledge that is shared between professionals or between experts and clients.

Another important trend is the increase in market competition and the search for expertise and lower labor costs. India now has a large number of well-educated engineers, and China has a large labor market of cheap employees. The availability of sound information and communication technology (ICT) infrastructures, for example, made the outsourcing of software development or call center services to these countries a viable solution some years ago. The ongoing globalization of markets and businesses leads to higher mobility requirements and widely distributed international cooperation. Customers for products or services, and the human resources needed to create a product or a service, are globally dispersed. Products and services are getting more complex and, to an increasing extent, are being based on knowledge from different domains and disciplines. This means that they require growing efforts to bring together and combine multiple expertise and competences in order to create specific customer solutions.

Technology is also a driving force through being an important enabler. Technological changes, particularly the developments in digital and wireless technologies and mobile and internet services, create the possibility of work being done at any place and time. Hamill and Lasen (2005) called this the "digital revolution" and found three key features that characterize digital technology. First, it reduces text, sound, picture, and film information, which leads to the convergence of devices. Second, it is easy to store information, which with increasing miniaturization means that it is cheap to store large quantities of data. Third, information is easy to transmit and reproduce.

Mobile technology provides essential tools for physically mobile employees and groups. Mobile tools are not only devices but also applications and services. A physically mobile employee also benefits from wired technologies in the places he or she visits and works in. Mobile and wireless technologies, however, are not equivalent, as Hayes and Kuchinskas (2003) noted. *Mobile* is the ability to carry a computing or connectivity device easily from location to location. Wireless is the ability to connect to remote servers to access information and applications via a wireless network. Not all wireless devices are mobile—for example, stationary devices in the office that are connected by Bluetooth or infrared—and not all mobile devices are wireless; sometimes a worker just needs to carry information or applications with him or her on the job but does not need to connect remotely to servers.

Mobile business models aim to provide new ways to benefit from wireless connections and mobile devices and services by redefining standard work processes and by increasing the ability to transfer information quickly to employees, wherever and whenever. In principle, physical and virtual mobility provides employees with the opportunity to be near customers and, at the same time, to be able to access joint enterprise resources, for example, data, guidelines, and work orders, from afar and while moving. In order to work, employees need a wireless network, devices, applications, and support. In mobile business models, mobility uses the capabilities of wireless networks to connect computers, smart phones, cars, and household appliances. Some like to talk about real-time enterprise—a business that eliminates the time lag in receiving critical information and acting on it.

Finally, there are the individual preferences of employees, related for instance to dual-income households with partners who work at distant locations and to international mobility in travel and living including the desire to keep in contact with the office during vacations.

To summarize, market and work processes stimulate the work-demand side—that is, what needs to be done and how. Demographic and social changes influence the worksupply side—that is, the kinds of workers that are available, their preferences, and their behavior. These changes force and enable organizations to develop new business strategies including increased shares of mobile virtual work in business and work. The direct consequence of all this is to be found in the growth of distributed work processes, network organizations, the physical mobility of workers, and intensive mediated interaction. This may bring many advantages for the organization such as greater flexibility, effectiveness, and innovativeness and for the employee such as dynamic and enriched work contents and a more flexible integration of work and private life. But it is not yet clear to what degree the new possibilities can bring risks. They may lead to workaholic behavior, higher stress levels, and lower job satisfaction. The work-life balance at home may be disturbed and interpersonal relations in the workplace loosened. Not much is known about the working conditions and safety of workers at home and when traveling. Therefore, it is beneficial to identify and profile what types of mobile and virtual work (MVW) can be found, before analyzing their implications and success conditions and developing guidelines for MVW settings that are both effective and sustainable.

Types of Mobility

Many things in work can be mobile. It helps to think of work as a system consisting of several interrelated components: an employee or a group working purposefully using tools to handle objects of work in some working environment. Mobility is related to all the components of this work system. The mobility of a team is shown as their physical mobility when they use different locations

and move between them. From the perspective of tools, team members may also be virtually and mentally mobile, meaning that they work together in virtual work spaces, exchanging and sharing thoughts and ideas electronically in digital format and externalizing them as products, for example, documents and drawings. The object of work moves as well or is transported from one place to another in physical (material) form or is transformed into electronic (e.g., immaterial, digitalized, or virtual) form. In addition, concrete tools—that is, technologies such as the means of production and communication, for example, mobile phones—are moved.

The physical mobility of employees is realized on at least two levels: Individuals move alone as members of a distributed team or organization, and teams and projects move as a part of a dispersed organization or network using different sites. Moving employees establish their "instant office" by adapting to and using the environment at hand and do so both repeatedly and quickly. If collaboration with distant colleagues is needed, this is possible with mobile, wireless information and communication technologies. Mobile employees travel, using ICT for communicating and collaborating with others at different locations. Therefore, mobile work is also telework in its traditional meaning of being performed out of the main office.

Individual E-Work

At the individual level, telework and remote work are terms that refer to all kinds of work and work arrangements carried out outside of a main office but related to it. In the traditional terminology, telecommuting means the substitution of physical travel by work. Telecommuting is a special case of the more common remote work, which refers to work performed away from a central work site (Olson & Primps, 1984, p. 98). In Europe, the term *e-Work* refers to all those work practices that make use of information and communication technologies to increase efficiency, flexibility (in time and place), and sustainability of resource use. It is evident that most of the employees in postindustrial societies are using information technologies in their work. E-Work, however, includes specific types of work (Electronic Commerce and Telework Trends [ECATT] 2000, pp. 8-11).

- 1. Home-based telework is the most widely recognized and best known type of e-Work. The majority of teleworkers divide their time between the home and the office, and they, therefore, are called "alternating teleworkers." Individuals who spend more than 90% of their working time at home are called "permanent teleworkers." "Supplementary teleworkers" are those who spend less than one full day per week teleworking from home. They are also called "occasional teleworkers" to distinguish them from regular teleworkers.
- 2. Self-employed teleworkers in SOHOs (small office home office) are private entrepreneurs such as consultants or

plumbers working and communicating with their contractors, partners, and clients by means of new technologies. The critical difference between teleworkers in SOHOs and home-based teleworkers is their market position as self-employed.

3. Mobile workers are those who agreed with the question: "In the last four weeks, have you spent any of your working time away from your home and from your main place of work, e.g. on business trips, in the field, travelling or on customer's premises?" (Lilischkis & Meyer, 2003, p. 8). High-intensity mobile workers are those who do so for 10 hours or more per week. In both cases, commuting to work is not included. Mobile e-Work is defined as high-intensity mobile work in the course of which an online connection to the Internet and/or to company computer systems is being used.

Types of Individual Physical Mobility

For the identification of physically mobile employees, Lilischkis (2003) used a topology based on the dimensions of space and time (Figure 84.3). Space criteria are (a) the number of locations, (b) the recurrence of locations, (c) whether there are headquarters to return to, (d) whether work takes place while moving or at a destination, (e) whether work can take place at fixed locations without changing it, (f) whether there is a limitation of the

work area, and (g) the distance between locations. Time criteria are (a) the frequency of changing location, (b) the time spent moving between work locations, and (c) the time spent at a certain work location if not moving. Each type of mobile work has its constitutive criterion. *On-site movers* work in a limited work area, *yo-yos* return to a main office, *pendulums* have two recurrent work locations, *nomads* work in more than two places, and *carriers* cannot do their work at a fixed location while moving.

The categories of micromobility (desk-based), multimobility (campus), and total mobility are also fruitful. The micromobility of an employee—that is, in-house and onsite mobility—increases primarily because of the implementation of the open office "flexispace" concept. Flexispace is a generic, adaptable space that can be used for a wide range of activities. Campus mobility, that is, citylevel mobility, grows from the need for multiple face-toface meetings with colleagues, clients, subcontractors, and partners in different nearby places. The use of individual wireless tools increases the potential for work in different places. Employees use visitors' working places at other sites belonging to the company in the district, and work at home as well. Together with flexible working hours, this may also make possible a better work-life balance and result in savings regarding total transportation times and distances. Fully mobile employees are nomadic, moving all the time, for example, journalists, multisite managers, and global sales persons.

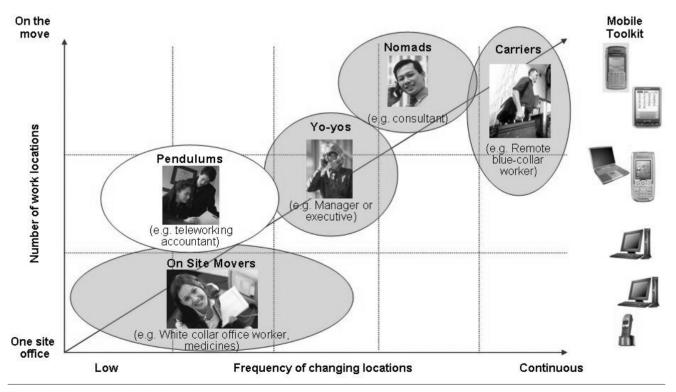


Figure 84.3 Types of Physically Mobile Employees SOURCE: Gareis, 2006; 22 based on Lilischkis, 2003; Schaffers, Brodt, Pallot, and Prinz, 2006.

Distributed Collaboration

Types of Distributed Collaboration

Whatever the organizational structure, groups and teams are its basic units. Virtual teams are groups of people who work interdependently with a shared purpose across space and time, using technology to communicate and collaborate (Lipnack & Stamps, 2000). Virtuality is a team characteristic that refers to the degree to which collaboration technologies are used; this is usually related to the degree of geographical distribution. In a similar manner, physical mobility is just one feature of team working. Martins, Gilson, and Maynard (2004) concluded in their comparison of virtual team definitions that the majority of definitions are founded on the condition that teams rely on technology-mediated communication while crossing different boundaries such as those of geography, time, and organization. Geographical distance refers to different employee locations, time refers to working asynchronously in different time zones, and team refers to team members who often come from different organizations or organizational units.

Virtual teams have many forms as they operate in a variety of environments that have different purposes and internal regulative processes to adapt to their environments. Bell and Kozlowski (2002) proposed that this variety of goals, tasks, contexts, and processes needed for internal regulation "produces" different types of teams. Common goals and tasks vary according to their complexity; that is, tasks are routine or creative, and they are less or more interdependent of each other. The contextual complexity may vary in six characteristics (Vartiainen, 2006, p. 30): (a) location, for example, the geographical distance of employees working in a group; (b) mobility, for example, the number of monthly travel days; (c) time, for example, synchronous or asynchronous collaboration in different time zones; (d) temporariness, for example, employees working temporarily in projects or in a permanent team; (e) diversity, for example, the composition of a team; and (f) the mode of interaction, for example, the frequency of face-to-face meetings. The task content and the context characteristics of a team create needs to organize intragroup processes and social support in such a manner that the team can survive. Next, the differences between different team types are explored in detail by using task and contextual complexities as differentiating factors.

Conventional, Distributed, Virtual, and Mobile Teams

Conventional teams comprise members who work together in the same location and communicate face-to-face. Other terms that have been used as synonyms include *traditional teams*, *face-to-face teams*, and *colocated teams*.

Task complexity itself does not differentiate distributed teams from conventional teams; the variation of task demands from simple to complex and their interdependence may be the same in both. Conventional team members jointly solve problems that are just as demanding and perform tasks that are just as creative as is the case with distributed teams. When studying the differences from the viewpoint of contextual complexity, members of conventional teams, as well as of distributed teams, often multitask and divide their efforts and time between several groups or projects, work only temporarily in a team, and are diverse in terms of their members' backgrounds and personal characteristics.

The remaining three characteristics of contextual complexity, however, make the difference between distributed teams and conventional teams more clearly visible. These are (a) *geographical distance* (i.e., crossing spatial boundaries), (b) *mode of interaction* (i.e., the way information, data, and personal communication are exchanged), and (c) the *physical mobility* of team members. Distributed teams' members work in multiple locations, communicate mainly electronically, and often move from place to place.

However, distributed groups and teams vary as well. At one end of the scale, distributed teams possess multiple characteristics of conventional work groups such as all members working in fixed places, though they are distributed. At the other end, there are the "ideal types" or prototypical global, highly mobile, virtual teams and projects such as management, marketing and sales teams, and new product design teams whose members may constantly move and may never meet each other face-to-face.

In practice, teams and projects are only seldom fully distributed and "virtual" in the sense of being at the extreme ends of the six characteristics: All members, different in terms of their backgrounds, move and work temporarily and asynchronously together over large distances using only ICT for their communication. The six characteristics of contextual complexity are closely related to and dependent on each other: A change in one of them results in changes in some or all of the others. Two examples are the greater the distance is between distributed employees, the greater the use of ICT is for collaboration, and the greater the physical mobility of an employee is, the more likely he or she is to meet and collaborate with people from diverse backgrounds.

In addition to variation in spatial distance, media use, and the mobility of team members, distributed virtual teams may also vary in the three other characteristics of contextual complexity: time asynchronicity, temporariness, and diversity. The combinations of these characteristics yield many possible types of distributed teams, only one of them being a fully virtual team.

In summary, it can be seen that groups and teams are complex entities, because their purposes, tasks, working contexts, and the intragroup processes needed to adapt vary greatly. All these factors are interlinked in such a way that a change in one of them influences others. Therefore, only rough categories of team types can be presented (see Figure 84.4). Conventional groups and teams differ from

TEAM TYPES

Conventional	Distributed	Virtual	Mobile virtual		
DIFFERENTIATING CHARACTERISTICS					
Face-to -face, here and now	Different locations	+ Electronic communication and collaboration	+ Physical mobility		

Figure 84.4 Types of Groups and Teams by Increasing Contextual Complexity SOURCE: Vartiainen et al., 2007.

distributed, virtual, and mobile teams especially in three characteristics: the geographical distance between their members, the mode of interaction, and physical mobility. Conventional groups and teams are colocated, communicate face-to-face, and work toward a joint goal here and now.

The main types of nonconventional teams, however, are (a) distributed, (b) virtual, and (c) mobile virtual teams. Team members working in different locations and their geographical distance from each other make a distributed team. A team becomes virtual when group members communicate and collaborate with each other from different locations via electronic media and do not meet each other face-to-face. Physical mobility of group members adds a new feature to distributed work. Mobile, virtual teams are always distributed; however, not all distributed, virtual teams are mobile. Virtuality, as in the use of ICT for communication and collaboration, makes a team into a distributed virtual team or mobile virtual team. In conclusion, it can be said that mobile virtual teams are the most complex types of teams to lead and manage.

Table 84.1 $Base \rightarrow$	Facilitating Mobile and Virtual Work				
	(a) at home or the same grounds	(b) on another site of employer	(c) at customers/ clients	(d) at a hotel/ meeting venue	(e) on the
at home or the same grounds	100.0	40.4	42.2	39.1	42.5
on another site of employer	11.5	100.0	52.5	57.4	55.6
at customers/ clients	17.4	76.0	100.0	64.6	71.9
at a hotel/ meeting venue	9.2	47.4	36.9	100.0	50.1
on the move	14.2	65.2	58.3	71.0	100.0

SOURCE: Gareis, Kordey, and Müller, 2004, p. 25; all multilocational workers; BISER RPS 2003, weighted.

WORKING IN MULTIPLE SPACES

Multiple Workplaces

The use of different locations characterizes a mobile workforce. Gareis, Lilischkis, and Mentrup (2006) suggested that to categorize teleworkers either as "homebased" or as "mobile" distracts attention from the fact that many teleworkers spend their working time at a number of different locations, among which the home is only one option (Table 84.1). This trend has obviously been made possible by mobile technologies, which have liberated workers from being bound to a particular space and time. For this phenomenon, the term "multilocational telework" is used. It implies that people work wherever it suits their work tasks, business schedule, and/or lifestyle.

Table 84.1 shows the share of those teleworking from one of the locations (columns) who also do telework at each of the other locations (rows). For example, of those persons teleworking from the home (a), 11.5% also work at another location belonging to their employer and use online con-

nections to stay in contact when doing so. As another example, 42.5% of those who telework on the move (e) also spend time teleworking from home.

Embedded Spaces

While staying and working in multiple locations, people are simultaneously embedded in their virtual and social spaces. The working contexts are combinations of these spaces and can be outlined from both individual and collective perspectives. From the individual point of view, each individual exists in a psychological field of forces that determines and limits his or her behavior. This implies and underlines the meaning of personal perceptions and interpretations of the contexts in use. The well-known classic social scientist Lewin (1951) called this psychological field the

"life space." It is a highly subjective space that deals with the world as the individual sees it. The life space is, however, according to Lewin, embedded in the objective elements of physical and social fields. As life space describes individual contexts, the concept of "ba" (Nonaka, Toyama, & Konno, 2000)1 focuses on shared contexts, in which knowledge is created, shared, and utilized by those who interact and communicate there, as often happens in collaborative knowledge work. Ba does not just mean a physical space, but a specific time and space that integrates layers of spaces. In this way, ba unifies the physical space such as an office premises, the virtual space such as e-mail, and the mental or social space such as common experiences, ideas, values, and ideals shared by people with common goals as a working context. Physical, virtual, and mental or social places are particular areas or positions in spaces in relation to others where individual workers and groups of people collaborate. The workplaces that virtual mobile employees use are described in the following sections by using the three shared space categories.

Physical Spaces

The physical environments that mobile employees use for working are divided into five categories: (a) home; (b) the main workplace (i.e., main office); (c) moving places such as cars, trains, planes, and ships; (d) a customer's and partner's premises or their own company's other premises (other workplaces); and (e) hotels, cafés, and so forth (third workplaces). As they all can be used for work purposes, they could all be referred to by the general term *offices*. So the office is a place where work takes place. For example, Van Meel (2000) distinguished locations that knowledge workers use for their work into

- central office, that is, a building where the workplaces of the employees from the same office or department are located;
- telework office, that is, a workplace that is physically disconnected from the central office;
- satellite office, that is, a telework office provided by the employer:
- business office, that is, a telework office provided by a commercial provider;
- guest office, that is, an office located in the building of a principal or client organization;
- home office, that is, a workplace located in the residence of an employee; and
- instant office, that is, a workplace instantly created by the user in a place that is not primarily designed for office work (e.g., airport lounge, train, etc.).

Virtual Spaces

A virtual space refers to an electronic working environment, to a virtual work space, or to collaborative working environments consisting of various tools and media for individual employees, groups, and whole organizations. The Internet and intranet provide a platform to communicate, collaborate, and find knowledge both with simple tools (e.g., e-mail, audio conferencing, videoconferencing, chat, group calendar, document management, presence awareness, and findability tools) and with collaborative working environments (e.g., personal digital assistants [PDAs], smart phones, groupware systems, and social software, e.g., Weblogs, wikis, instant messaging, chat, and other communications systems that host many-to-many interactions, support groups, and community interaction).

Harrison, Wheeler, and Whitehead (2004) called the combination of physical work settings and virtual space a "workscape." The term workscape² refers to the "layers of where we work"—that is, the constellation of (a) real and virtual work settings (i.e., furniture + IT), within (b) particular spaces (i.e., meeting rooms, project areas, cafés, etc.), that are, again, (c) located in a specific environment (i.e., office building, city district, street, home, airport, bus, etc.). Together they form a hybrid work environment. As Morville (2005) noted, the challenge is how to design and select tools for mobility when we cannot predict the context of the mobile user. The only way out is to install interfaces in all the physical spaces in use—a world where we can find anyone or anything from anywhere at any time does not exist yet, though we are headed in that direction.

Mental/Social Spaces

A mental/social space refers to the cognitive constructs, thoughts, beliefs, ideas, and mental states that employees share. Creating and forming joint mental spaces requires communication and collaboration such as exchanging ideas in face-to-face or in virtual dialogs.

As a summary, the working contexts of individuals and groups are today combinations of physical, virtual, mental/ social, and cultural working spaces, especially in collaborative work (Figure 84.5). The use of various spaces varies, depending on the type of work and interdependence of the tasks to be done. Individual telework in solitude at home without virtual connections to others is an extreme and rather rare case. Usually home-based teleworkers communicate sporadically with superiors and colleagues face-toface by commuting to the main office. When employees are working in multiple locations, the combination and emphasis of their spaces are different from colocated employees, just because of the greater number of physical places they rotate and use. Still, they need not communicate virtually. The significance of virtual spaces grows when members of a distributed team communicate and collaborate from different locations with each other. They not only are distributed in physical places but also simultaneously use virtual places (videoconferencing and documents shared on the intranet), and they are related to other team members who must share common goals (social space) to be able to reach

Physical Spaces - Settings - Arenas - Environments - Tasks	Home	Main workplace(s) 'Office'	Moving places, ri.e. trains, airplanes, ships	e.g. clients and suppliers' places	Third workplaces e.g. notel, calcongress venue
Virtual Spaces - Connections - Devices - Services - Purposes - Functionality	PC, phone, Internet, broadband, wlan	Intranet, communicat- ion and collaboration systems	Mobile devices	Intra- and extranet, Internet	Laptop, intranet
Mental and Social Spaces - G&O and HRM issues	Tranquility, well-being family	Shared goals and values, 'stress', peers	Change and solitude, strangers	Trust, partners	Interruptions, mostly strangers

Figure 84.5 Types of Work Spaces in Mobile and Virtual Work SOURCE: Vartiainen et al., 2007.

the aim and possibly to share common ideas, beliefs, and values (mental space).

ENABLING MOBILE WORK

Benefits and Drawbacks of Working in Multiple Places

Working in multiple places and while moving to them has its benefits and drawbacks for both an employer and an employee. For example, some companies use teleworking or remote working as a way to avoid transportation problems and adapt to environmental legislation. Others want to increase the size of their labor pool by including people that would not otherwise be able to work such as disabled workers or not willing to work such as an expert with rare competences who wants to stay at their present residence. Still other organizations have an even more human-centric view and want to reduce employee stress resulting from commuting and balancing home and work life. Critical voices claim that organizing work in multiple places in effective ways just offers an additional way of intensifying work. Nevertheless, the most common goal and the crucial driver for companies is the desire to reduce costs and increase profitability.

The working days of many mobile knowledge workers are blurred, as there is no specific time or place at which it is possible for work to start or end. People work all the time both in solitude, virtually asynchronously, and synchronously, online and in face-to-face collaboration with others when visiting their offices. It is often rather difficult to separate working in solitude from collaborative work, even when working at home. Working in solitude takes place in "pseudoprivacy," that is, it is interrupted by numerous e-mails, text messages, calls, and online virtual meetings. The increasing findability and awareness of others' locations and availability reduces the feeling of autonomy and increases that of external controllability. Thus, the nature of work seems to have become more blurred at several levels.

It, however, is possible that new flexible ways of working and the implementation of a new workplace strategy are a win-win situation for both companies and employees. It seems that employees look for more autonomy and control over their work, as well as a better balance between work, family life, and leisure. Next, the benefits and drawbacks of mobile multilocational work are described from the viewpoint of five types of physical places.

From a company's point of view, working at home reduces the need for office premises and transportation and the costs associated with them. Reduced transportation

results in a reduction of traffic congestion and air pollution. The ability to work at home may also attract and retain certain highly valued employees, thus broadening the workforce pool. On the other hand, companies' responsibilities based on legislation (e.g., example insurance liabilities) increase. Management control over work performance is lost as the visibility of employees is lower. Employees may commit only weakly to the organization, and there are challenges to renew bases of compensation. Building a home office, for example, furniture, equipment, rent, and additional media lines, also costs money. From an employee's viewpoint, working at home can result in increased feelings of autonomy and self-control over time. Homes are places where interruptions at the office can be avoided and where one can do work that needs concentration. The time used is increased because of no commuting. There is freedom to choose when to work and when to have personal time. This may lead to a higher quality of personal life and more effective work. On the contrary, "workaholism" may be exacerbated. The main challenge is work spilling over into family life and leisure time and is the balance between these. Additionally, there are also interruptions at home if children are small. Work space can be inadequate and separate working places are costly. Because of reduced staff interaction, there is a lack of social contact and isolation from the flow of information, support, and help from management and colleagues. A deterioration of the relationship with supervisors may harm promotion prospects.

Open areas in main offices save companies money as more people are using the same number of square meters. The dilemma of open offices is whether they should be a social setting or a place to concentrate full-time on task execution. There is also more interaction between managers and their teams (if that is valuable), which also results in quicker decisions because of enhanced communication. On the other hand, employees may be reluctant to give up their own space. Not all work can be done in an open office. Too high a density may become counterproductive, and the size of teams may create occasional space shortage, resulting in scheduling conflicts. Investments in equipment and training are also probable. From the employees' point of view, working in the same space encourages interaction and the potential for rich and fluent communication. This increases social support and feedback from colleagues. Business is performed in a spontaneous, informal, and flexible manner, which increases both explicit and tacit learning. Alternatively, many studies show that work in offices is frequently interrupted, which may seriously reduce work productivity. Difficulties in concentrating increase because of uncontrolled noises and interruptions such as uninvited chatting and being asked questions about work and disturbances created by meetings within the space. The feeling of privacy is lost. Two or several people may compete to use the same desk and may not find a place to work. Storage can be problematic. Nevertheless, offices are places for meetings and dialogs, which are necessary for creating something new and for decision making.

Little is known about working in moving workplaces. Once again, a company can save on the costs of premises, and it is better able to respond to customers' needs. On the other hand, providing employees with communication tools increases costs. There is no direct control over employees, as tracking them may be unethical. From the employees' point of view, there is an opportunity to interact with interesting strangers and go to exotic places to work. Traveling also provides chances to be alone and to think and reflect. The opportunities to concentrate on reading, writing, using a mobile phone, and consulting documents also increase. On the other hand, the main challenge is the necessity to adapt to changing environments again and again. What is possible in one space is not possible in another. There also seems to be some difference between working in public places such as trains and working in a private car. Public transport throws large numbers of strangers together in enclosed spaces under each other's observation and leads to unwanted interaction with strangers. The car allows drivers more choice as to their types of social encounters. In order to work, it is necessary to take along numerous devices to communicate and collaborate, though missing power sockets are a common nuisance.

From a company's viewpoint, "other workplaces" such as satellite and telework offices also usually reduce costs per square meter because of their location away from business centers. Working in them may also promote environmental protection by reducing traffic congestion, energy consumption, air pollution, and the number of commutes. They may also increase the availability of skilled personnel. Alternatively, there are extra costs related to communication and collaboration technologies. Remote management is a challenge as indicators to measure performance may be missing, as well as guidelines on how to act. In some cases, protecting company secrets represents a challenge. From an employee's viewpoint, working near home may bring about a better quality of life, though working far from the main office may disconnect an employee from his or her work community. Working in a satellite office near the home helps in avoiding the harmful mixing of work and family life, compared to teleworking at home. In addition to saving time, the reduced commuting time to and from the main office reduces employee stress related to commuting. On the other hand, social contacts with peers and preserving one's professional identity are challenges.

There may be feelings of disconnectedness from the organization. Working in satellite office may also impede interoffice communication because of technological limitations such as missing power sockets and wireless connections.

Third workplaces include hotels, cafés, and conference venues, as well as the public areas and lounges of airports. They are quickly available and easy to access. Their benefits from a company's point of view once more concentrate on cutting costs. Working in these places also means more working hours. On the contrary, if they are in permanent use, the public image of the company may suffer. Investing

in the technologies that are needed is not without its costs. Additionally, protecting confidential information is a challenge. From the viewpoint of third place owners, the possibility of working may attract new customers, as happens in cafés. From an individual viewpoint, feelings of freedom and control over time and schedule may increase. Easy access contrarily may reduce the ability to separate work from personal life. Privacy and personal space are missing, and there may be interruptions. Reduced social interaction with coworkers results in the loss of opportunities to learn from others. The technological infrastructure and devices that are needed in order really to be able to work are often lacking.

In all, there seems to be the dilemma of control versus trust and empowerment from the viewpoint of management, and the dilemma of full findability versus autonomy and work-life balance from the viewpoint of employees. The change from the one-place office—be it home or any other permanent place—to the multiple-place office, which could be called a mobile virtual office for multilocational collaborative work, is a long jump. It may increase employees' self-regulation, control, productivity, happiness, and time spent with clients because of reduced commuting time and, especially, reduced space and occupancy costs. At the same time, it may reduce professional and social interaction between employees and between employees and management, reducing employees' rights and connections to the organization, and upset the balance between work and life.

Managing a Mobile Workforce

Uncertainty and the need for continuous change have implications for mobile work management strategies. As Ashby's (1958) law of requisite variety says, the greater the variety in environment of a system, the greater the variety that should be within the system to adapt properly to its environment. The changes in workplace strategy and alternative officing have great effects on the organization, its human resources functions, and on the required technologies. Multilocational virtual work challenges the social functions of a traditional organization such as socializing, commitment, knowledge sharing, and organizational learning. The challenge is to develop a model for which alternative work options are the norm. This requires a fundamental change of mind-set.

New types of work are challenges for managers and workplace designers, as well as for human resources and knowledge management specialists, not to mention employees themselves, who should change their mind-sets to be able to adapt to and participate in the change. Helping corporations to gain the competence to design the infrastructure to support and enable this distributed mobile work is at the core of helping them to be productive and agile. The alignment of work, space, people, and information technology, in fact, has become a practical necessity for all organizations.

There are many now long-lived and still-growing good examples of company policies and practices to successfully

support mobile virtual work and collaboration. It seems to be possible to combine a company's economic benefit with the work-life balance and satisfaction of its employees. This requires flexibility strategies and well-defined policies from the company's side.

As work becomes more geographically distributed and is mobile, strains develop that reveal latent and often unexamined dimensions of collaboration. Management typically has to rely more on results than on the supervision and direct control of behavior that are typical of traditional organizations. The motivation of employees and social bonding—two of the major benefits of face-to-face communication—have to be at least partly accomplished in other ways. With increased dependence on communications, communication and collaboration tools substitute for face-to-face information. The increased autonomy of the individual requires more explicit articulation of the formal and informal contracts that bind him or her to the purposes of the organization.

A psychological contract represents the mutual beliefs, perceptions, and informal obligations between an employer and an employee. It sets the dynamics for the relationship and defines the detailed practicality of the work to be done. It is distinguishable from a formal written contract of employment, which, for the most part, identifies only mutual duties and responsibilities in a generalized form. The roles and practices of participating employees must necessarily shift in order to maximize the benefits arising from the new mobile work situation. Good team members know how to exploit the skills and expertise of others, but the mutual understanding that makes such behavior possible is more difficult to achieve with greater dispersion and mobility of team members. There is a loss of subtlety in communication from not being able to see facial expressions and bodily gestures and from not being able to share informal moments between substantive exchanges. Moreover, when relationships with other team members become restricted to formal occasions that are strictly to do with project purposes, a diminution of the opportunity for further communication can arise in informal situations.

The traditional hierarchical organization based on direct control by superiors and colleagues is dissolving and being replaced by flexible networked, often temporary, work connections, that is, grouplike work. *Grouplike* means flexibly organized tasks and employees participating simultaneously in several professional and informal groups, organizations, and communities.

The contents of recruiting and training employees have to be reconsidered. Not everyone is suited to working in a mobile virtual manner, perhaps for work-family-leisure-balance reasons, for example. The integration of newcomers into a mobile work environment is a challenge because they traditionally learn "tacitly" by observing, experimenting, and acquiring information from supervisors and coworkers.

Information and communication technologies are the enablers of multilocational work. From the technological

viewpoint, the multilocational mobile office implies employees equipped with laptop computers and smart phones with wireless access to an information network working at home and clients' offices, on the move, and in hotels. When they sometimes come to the office to meet their colleagues and superiors, they log onto the intranet, where they can find the databases that may not have been accessed from a distance for security reasons. Electronic communication and collaboration can replace social contact to some degree, but not fully.

In all, it is a question of developing and using such workplace strategies and policies that align places, people, and technologies and that are able to manage change.

FUTURE DEVELOPMENTS

The prevalence of new types of work has increased rapidly during the last ten years and will continue to do so. For example, Gareis et al. (2006) showed that telework in Europe, including home-based telework (at least one day/ week), supplementary home-based work, mobile e-Work, and freelance telework in SOHOs increased from 6% in 1999 to 13% in 2002. In Britain, the number of people using their home in order to work in a variety of places—that is, the number of mobile workers—has more than tripled over the last two decades. This accounted for around 2.1 million people in the United Kingdom in 2002 (Felstead, Jewson, & Walters, 2005, p. 59). ITAC, the Telework Advisory Group for World at Work (2005) reported that, during the previous month, of 135.4 million American workers, 45.1 million worked from home, 24.3 million people worked at clients' or customers' places of business, 20.6 million worked in their cars, 16.3 million worked while on vacation, 15.1 million worked at parks or outdoor locations, and 7.8 million worked while on trains or airplanes. The study of Uhmavaara et al. (2005) in Finland showed that, at one time or another, 40% of employees worked either from home, on business trips, at customers' workplaces, or at different locations belonging to the same business. Hertel, Geister, and Konradt (2005) reported a survey among 376 business managers in Germany that revealed that about 20% of the managers worked predominantly as members of virtual teams, and about 40% worked at least temporarily in virtual teams. This is equivalent to the prevalence in North America as shown in the summary of Martins et al. (2004): more than one half of the companies with more than 5,000 employees use virtual teams and 60% of professional employees work in them.

In the future, this development and increase of mobile and virtual work will be closely integrated into the development of technologies, expanding bandwidths, and eversmarter mobile devices. Through the broadband mobile Internet, you will have access to multiple communication functions including e-mail, the Internet, instant messaging, text messaging, and a company network. As Castells, Fernández-Ardévol, Qui, and Sey (2007) wrote,

The mobile network society deepens and diffuses the network society. . . . First on the basis of networks of electronic exchange, next with the development of networks of computers, then with the Internet, powered and extended by the World Wide Web. Wireless communication technologies diffuse the networking logic of social organization and social practice everywhere, to all contexts—on the condition of being on the mobile Net. (p. 258)

Management have to change their mind-sets, know the needs of their workforces, and develop new workplace strategies and policies that combine premises, technological, and human resources management together.

NOTES

- 1. *Ba* roughly means *place*. The concept was originally proposed by the Japanese philosopher Nishida (1921) and further developed by Shimizu (1995; see also Nonaka et al., 2000, p. 14).
- 2. The concept of a workscape was initially developed by Becker and Steele in their book *Workplace by Design* (as cited in Harrison et al., 2004, p. 56).

REFERENCES AND FURTHER READINGS

- Andriessen, J. H. E., & Vartiainen, M. (Eds.). (2006). *Mobile virtual work—A new paradigm*. Heidelberg, Germany: Springer-Verlag.
- Andriessen, J. H. E., & Vartiainen, M. (in press). Mobile virtual work in a globalizing world. In B. Wilpert & D. Manzey (Eds.), *Global challenges to work place health and safety*.
- Ashby, W. R. (1958). Requisite variety and its implications for the control of complex systems. *Cybernitica*, *1*, 83–99.
- Baecker, R. M. (1993). Readings in groupware and computersupported cooperative work assisting human-human collaboration. San Francisco: Morgan Kaufmann.
- Bell, B. S., & Kozlowski, S. W. J. (2002). A typology of virtual teams: Implications for effective leadership. *Group & Organization Management*, 27(1), 14–49.
- Castells, M., Fernández-Ardévol, M., Qiu, J. L., & Sey, A. (2007). *Mobile communication and society: A global perspective*. Cambridge, MA: MIT Press.
- Electronic Commerce and Telework Trends. (2000). Benchmarking progress on new ways of working and new forms of business across Europe: ECATT final report [Electronic version]. IST programme, KAII: New methods of work and electronic commerce. Bonn, Germany: Empirica.
- Felstead, A., Jewson, N., & Walters, S. (2005). *Changing places of work*. New York: Palgrave Macmillan.
- Gareis, K. (2006). New work environments: An overview of available evidence on success factors and impacts. Bonn, Germany: Empirica.
- Gareis, K., Kordey, N., & Müller, S. (2004). Work in the information society—The regional dimension (BISER Domain Rep. No. 7). Retrieved September 3, 2007, from http://www.biser-eu.com/10%20Domains%20Report/BISER_Work_fnl r.pdf
- Gareis, K., Lilischkis, S., & Mentrup, A. (2006). Mapping the mobile eWorkforce in Europe. In J. H. E. Andriessen & M.

- Vartiainen (Eds.), *Mobile virtual work—A new paradigm* (pp. 45–69). Heidelberg, Germany: Springer-Verlag.
- Goggin, G. (2006). Cell phone culture: Mobile technology in everyday life. Oxon, UK: Routledge.
- Hamill, L., & Lasen, A. (Eds.). (2005). *Mobile world: Past, present and future*. New York: Springer-Verlag.
- Harrison, A., Wheeler, P., & Whitehead, C. (Eds.). (2004). *The distributed workplace*. London: Spon Press.
- Hayes, K., & Kuchinskas, S. (2003). *Going mobile: Building the real-time enterprise with mobile applications that work.* San Francisco: CMP Books.
- Hertel, G., Geister, S., & Konradt, U. (2005). Managing virtual teams: A review of current empirical research. *Human Resource Management Review*, *15*(1), 69–95.
- Hyrkkänen, U., & Vartiainen, M. (2005). *Mobile work and wellbeing. Työpoliittinen tutkimus, no. 293*. Helsinki, Finland: Työministeriö.
- ITAC, the Telework Advisory Group of World at Work. (2006). Annual survey shows Americans are working from many different locations outside their employers office. Retrieved September 3, 2007, from http://www.workingfromanywhere.org/news/pr100405.html
- Kellerman, A. (2006). Personal mobilities. London: Routledge.
- Lewin, K. (1951). Designing the "field at a given time." In D. Cartwright (Ed.), *Field theory in social science, selected theoretical papers by Kurt Lewin* (pp. 43–59). New York: Harper.
- Lilischkis, S. (2003). *More yo-yos, pendulums and nomads: trends of mobile and multi-location work in the information society* (Socioeconomic Trends Assessment for the Digital Revolution Issue Rep. No. 36). Bonn, Germany: Empirica.
- Lilischkis, S., & Meyer, I. (2003). Mobile and multi-location work in the European Union—Empirical evidence from selected surveys. (Socioeconomic Trends Assessment for the Digital Revolution Issue Rep. No. 37). Bonn, Germany: Empirica.
- Lipnack, J., & Stamps, J. (2000). Virtual teams: People working across boundaries with technology. New York: Wiley & Sons.
- Martins, L. L., Gilson, L. L., & Maynard, M. T. (2004). Virtual teams: What do we know and where do we go from here? *Journal of Management*, 30(6), 805–835.
- Morville, P. (2005). *Ambient findability*. Sebastopol, CA: O'Reilly.
- Nishida, K. (1921). Fundamental problems of philosophy: the world of action and the dialectical world. Tokyo, Japan: Sophia University.
- Nonaka, I., Toyama, R., & Konno, N. (2000). SECI, *ba* and leadership: A unified model of dynamic knowledge creation. *Long Range Planning*, *33*(1), 5–34.
- Olson, M. H., & Primps, S. B. (1984). Working at home with computers: Work and nonwork issues. *Journal of Social Issues*, *40*(3), 97–112.

- Schaffers, H., Brodt, T., Pallot, M., & Prinz, W. (2006). The future workspace: Perspectives on mobile and collaborative working. Enschede, Overijssel, Netherlands: Telematica Instituut.
- Shimizu, H. (1995). Ba-principle: New logic for real-time emergence of information. *Holonics*, *5*(1), 67–79.
- Steinbock, D. (2005). The mobile revolution. The making of mobile services worldwide. London: Kogan Page.
- Uhmavaara, H., Niemelä, J., Melin, H., Mamia, T., Malo, A., Koivumäki, J., & Blom, R. (2005). Joustaako työ? Joustavien työjärjestelyjen mahdollisuudet ja todellisuus. Helsinki: Työministeriö.
- Van Meel, J. (2000). The European office—Office design and national context. Rotterdam, South Holland, Netherlands: 010 Publishers.
- Vartiainen, M. (2006). Mobile virtual work—Concepts, outcomes and challenges. In J. H. E. Andriessen & M. Vartiainen (Eds.), *Mobile virtual work—A new paradigm* (pp. 13–44). Heidelberg, Germany: Springer-Verlag.
- Vartiainen, M., & Andriessen, J. H. E. (in press). Virtual teamworking and collaboration technologies. In N. Chmiel (Ed.), *An introduction to work and organizational psychology: A European perspective* (2nd ed.). Blackwell.
- Vartiainen, M., Hakonen, M., Koivisto, S., Mannonen, P., Nieminen, M. P., Ruohomäki, V., et al. (2007). *Distributed and mobile work—places, people and technology*. Helsinki: Yliopistokustannus University Press Finland.
- Verburg, R. M., Testa, S., Hyrkkänen, U., & Johansson, N. (2006).
 Case descriptions of mobile virtual work in practice. In J.
 H. E. Andriessen & M. Vartiainen (Eds.), *Mobile virtual work—A new paradigm* (pp. 267–288). Heidelberg, Germany: Springer-Verlag.

CROSS-REFERENCES

Future Directions in Labor Relations: A 2025 Perspective (17) Global Mind-Set (18)

Transnational Teams in Knowledge-Intensive Organizations (34) Global Projects as New Organizational Form (47)

The Evolving Nature of Work Teams: Changing to Meet the Requirements of the Future (50)

Coordination in Global Teams (52)

Flexible Labor (59)

Diversity and Diversity Management in the Age of Globalization (64) Remote Leadership (78)

Leadership in Interorganizational Networks (79)

Balancing the Implications of Employee Telework: Understanding the Impacts for Individuals and Organizations (85)

BALANCING THE IMPLICATIONS OF EMPLOYEE TELEWORK

Understanding the Impacts for Individuals and Organizations

TIMOTHY D. GOLDEN

Rensselaer Polytechnic Institute

elework is an increasingly popular form of 21stcentury work in which individuals carry out their jobs away from the central company office using computer technology. Due to telework's dramatically increasing popularity, researchers have begun to devote greater attention to understanding telework and the implications this new form of work has on individuals and organizations. This chapter is therefore devoted to providing an overview of telework research and the inherent trade-offs employees and managers must consider when making decisions about telework. After a brief review of the factors influencing telework's growth and the forms of telework, the chapter will summarize important research findings for telework's positive and negative impacts on employees and the organization. Each of these areas will incorporate important findings from prior telework research. Then, several key areas of emerging research will be reviewed, which promise to shed important insights into our understanding of telework's implications. The chapter will conclude with a discussion of crucial implementation challenges for the employee and organization and suggestions for helping to improve telework success.

FACTORS INFLUENCING TELEWORK'S GROWTH

Telework has been experiencing tremendous growth in recent years, and this trend is projected to continue at even higher rates in the years to come. With its popularity more than doubling in a 2-year period, the growth in telework is occurring globally, including much of Europe, Australia, Canada, and the United States. A number of factors have combined to fuel this explosive growth. First, companies are responding to employee needs for greater capability in dealing with increased family demands, as the number of dual-career and single-parent households continues to grow. Moreover, employees are demanding greater flexibility to accommodate leisure activities and to be able to work independent of location. Companies tend to view telework as a tool to help attract and retain talented employees, who might otherwise be less satisfied with their work and have a higher tendency to leave the organization. Companies also look upon telework as a means to reduce the costs of office space, since employees who do not work in the office full time need less office space. Computer technology has also made telework increasingly convenient and cost effective. Such technology has enabled reliable and robust remote access to corporate databases, flexibility in remote communication, and easy and convenient tools for interacting with others from a distance. Finally, following tragic and horrifying terrorist events, individuals and companies have begun to look at telework as a means to ensure business continuity by providing a means for employees to remain working and productive if the office space or travel is disrupted. Together, these factors have combined to produce unprecedented increases in telework as a preferred work mode.

FORMS OF TELEWORK

When people think about telework, they likely have a number of different concepts in mind. Telework, also known as telecommuting, is a new form of work that generally involves working away from the office by using computer technology to communicate. Most people who telework do so from home for a portion of their work week (e.g., 1–4 days/week) and spend the rest of the time in the office. Telework can also be conducted from satellite work centers, airports, hotels, and client sites all of which are removed from the central company office and involve working while remaining connected to others via computer, phones, and other electronic devices. Employees in large cities typically use satellite centers to avoid lengthy commutes by driving to a center near their home to utilize a desk, computer hookups, copy machines, and the like. While less common than working from home, many researchers still consider satellite centers a form of telework. Moreover, while some people work from home full time, researchers generally consider these individuals to be home-based workers or virtual workers rather than teleworkers, and therefore do not consider them part of the general telework population. Considering the wide variety of telework forms and the definitional differences in the research literature, it is therefore important to be clear about exactly what form of telework is being considered when reading and interpreting research studies.

TRADE-OFFS IN TELEWORK

Given telework's tremendous growth, researchers and practitioners have begun to unravel the many complexities of this technology-enabled work mode. While research is ongoing, some initial trends can be drawn that begin to paint a picture of the careful balance that must be struck if telework is to be successful. In particular, evidence from research indicates telework has both positive and negative implications for a range of important employee and organizational outcomes. Moreover, each aspect of telework may have both positive and negative implications for the individual or organization, and as will be discussed more next, careful consideration of the full range of impacts of telework is needed before important decisions are made. The next section will highlight major research findings in order to shed insights into the wide spectrum of individual and employee impacts from telework.

HOW TELEWORK IMPACTS INDIVIDUALS

Positive Impacts on Individuals

Telework has been reported to have many positive effects on the individual. Perhaps the most often cited advantage is increased job satisfaction (Bailey & Kurland, 2002).

Telework offers individuals the opportunity to more easily adjust work tasks to suit their own needs, and therefore gain greater control and flexibility while still accomplishing their work. A greater sense of autonomy in one's job is an important psychological state that leads to job satisfaction. By adjusting work tasks to meet their own individual needs and desires, teleworkers can better accommodate nonwork demands and desires that would otherwise interfere with their work. For example, a teleworker may simply need to be present at home to either meet a child's school bus or be there in case of an emergency, and being able to work from home therefore decreases worry and stress that might otherwise occur during the course of his or her work day. Thus, by eliminating unwanted or unnecessary stress from their work, teleworkers are reported to enjoy their jobs more and have greater job satisfaction.

Another positive impact of telework is saved commute time. Surveys of teleworkers show that the absence of a commute generally saves about 1 hour per day, which teleworkers are then free to apply to spending more time working or meeting their desires for outside activities or family. The absence of a commute can be particularly beneficial when commuting long distances, or when dealing with heavy traffic congestion or bad weather. Not only does the absence of a commute save money and time, it also reduces stress and enables individuals to accomplish other more desirable activities. For instance, by saving time and avoiding a commute, an individual may be able to attend a child's sport game or pick up a child from an afterschool activity. The individual could also use the additional time to complete job tasks or carry out a job task more thoroughly. Either way, the absence of a commute due to telework enables individuals to accommodate other desirable activities which would otherwise not be possible.

Research on telework has also recently focused on its impacts on work-family conflict. This type of conflict occurs when performing one's work role interferes with the performance of one's family or nonwork role, or alternatively when one's family role interferes with the ability to carry out one's work role. In a large study conducted in a high-tech organization, Golden, Veiga, and Simsek (2006) found that the more extensively individuals teleworked, the lower the level of work-to-family conflict. However, they also found that the more extensively individuals teleworked, the higher the family-to-work conflict. In other words, telework seemed to present both positive and negative impacts in terms of conflict between work and family. From one perspective, the more extensively individuals teleworked, the less their work interfered with their family. This may be due to the saved time, stress, and money associated with not having to commute to work. From the other perspective, however, the study also found that the more individuals telework, the more that their family tends to interfere with their work. Since teleworkers tend to work from home more, family members or demands from family obligations may impinge upon the individual's ability to work, creating greater conflict in terms of family-to-work conflict. The impact of telework on work-to-family and family-to-work conflict was also found to be influenced by the nature of the jobs held by individuals and their family situations, suggesting the complexity of this type of research. Although more research is needed, the benefits of telework in terms of work-family conflict continue to be a leading reason individuals choose to telework, and therefore a fertile area for future research.

Telework has also been reported to increase employee productivity and performance, although as of yet this is somewhat less supported by empirical research. Teleworkers report they are more productive due to saved time and an enhanced ability to control interruptions from colleagues and others (Guimaraes & Dallow, 1999). By lowering distractions typically found in an office environment, teleworkers report they achieve greater focus and concentration in their work and are therefore able to work more efficiently and with better results. Interview data suggests that teleworkers utilize the more controlled environment presented by teleworking from home to their advantage, blocking out unnecessary interruptions that might be found in a typical office environment. Instead of having to respond to coworkers or others simply because they stop by their office or cubicle, teleworkers can choose to respond to requests from others when it is best for their own work tasks, and therefore achieve their own higher quality work outcomes such as enhanced productivity.

A common thread in all these advantages of telework is the freedom and flexibility provided by the ability to work remotely away from the office. By untethering the employee from the central company office, telework provides the opportunity to accomplish additional tasks or shift tasks to more desirable periods. For instance, if the job permits, a teleworker may choose to work from 9 a.m. until 3 p.m., and then take time off for children and home needs, and then continue with work later in the evening. While not all jobs permit such scheduling flexibility, research suggests that employees who have this type of flexibility in their jobs are able to derive great benefit from telework.

Negative Impacts on Individuals

Perhaps the most commonly cited negative impact of telework is its isolating effect (Cooper & Kurland, 2002). Due to separation from the office and coworkers, teleworkers often report feeling left out of office activities and events. Teleworkers are no longer privy to chance encounters by the water cooler or elevators and as a result lose out on casual informal interactions that build relationships and camaraderie. Moreover, teleworkers miss out on lunch conversations and other interaction opportunities in which valuable office information may be exchanged. The absence or reduction in such informal interactions limits the information they receive about office events or other pertinent activities, which not only leave them feeling isolated but may also hinder their ability to do their job.

Similarly, communication problems are also known to plague teleworkers (Allen & Renn, 2003). While most teleworkers remain connected to the office via telephone, e-mail, and access to corporate databases, the relative isolation and more limited communication that occurs between teleworkers and others in the office tends to decrease morale and hurt perceptions of being part of the office. Teleworkers report having to make extra effort just to stay abreast of office communication, which otherwise occurs spontaneously due to close physical proximity. For instance, while a simple yet important comment or remark might occur naturally when engaged in a face-to-face conversation, that same remark or comment may be far less likely to occur over e-mail. E-mail communication has been shown to be far less rich and complete than face-to-face interactions, with the result that reliance upon e-mail leaves the receiver of the communication with less information. For a teleworker, the greater reliance on e-mail rather than face-toface communication dramatically increases the likelihood that he or she will receive incomplete or missing information regarding important office activities, with potentially negative consequences. Such communication challenges as a result of telework may impede the ability of teleworkers to conduct their job, leading to increased frustration, less job satisfaction, and even ultimately to a greater likelihood of leaving the company.

Telework may also increase the amount of conflict that individuals experience between their work and family lives (Hill, Miller, Weiner, & Colihan, 1998). As noted above, while telework may decrease the conflict experienced due to work impacting family, telework is also apt to increase the extent to which family impacts work. With a greater proportion of time spent working at home, telework opens up a whole host of additional distractions and opportunities for diversions from work that are not otherwise present in the work environment. As a result, family intrusions into work may be greater or more difficult to contain, leading to greater conflict of family demands with those stemming from work. Literature suggests some of these problems may be avoided or limited by maintaining a separate workspace in the home used solely for work, and ensuring that family members do not interrupt the teleworker during work time. While following these guidelines will not eliminate all family-based distractions, they may help the teleworkers limit unnecessary and undesirable conflict experienced from working at home.

By virtue of their separation from the office, teleworkers may also lack technical support. Since teleworking involves greater reliance on technology to communicate and interact with others in the office, teleworkers are especially vulnerable to fluctuations in technology and its correct operation. If a piece of equipment or software is not functioning correctly, increased stress, aggravation, and frustration are apt to result. Due to distance, teleworkers may also not have access to the same level of support or ease of access to support, since most companies are set up to provide technology support only to on-site employees. The greater difficulty

in obtaining help with technology not only increases frustration, but also further impedes teleworkers' ability to remain connected to others in the office and ongoing office activities.

Research based on interviews with teleworkers and practitioner articles suggest that teleworkers may experience detrimental career impacts (Vega, 2003). Since teleworkers are separated from others, they are more apt to be "out of sight, out of mind" in regards to choice opportunities or assignments. Moreover, due to their separation, managers and others have fewer opportunities to observe their work performance. This increases the likelihood of biases and stereotypes in their performance ratings. While teleworkers must generally be managed by results rather than "face time," managers and others may not be comfortable with a new approach to management for workers they cannot easily observe, and therefore may be more prone to judge them less positively. Indeed, fear of negative career impacts is one of the leading reasons why individuals do not choose to telework when given the option to do so.

Finally, research is beginning to emerge that shows telework may have negative implications for relationships between the teleworker and his or her manager and coworkers (Golden, 2006b). It appears the teleworker's separation from the office environment and its social milieu may strain relationships or prevent relationships from becoming as strong as they might be otherwise. Since teleworkers rely more heavily on e-mail and telephone to communicate with others in the office, the richness of communication and interactions with others are likely to be less than if communication and interaction were carried out face-to-face. Research has shown that many cues are necessary for effective communication and are not conveyed in media such as e-mail and telephone. Missing are gestures, nonverbal body language, voice intonations, and the like. As a result, when communication with coworkers or supervisors takes place largely through e-mail, which is apt to be brief or incomplete, understanding is diminished and the relationships are apt to suffer over time. In these relationships, conflict is apt to be higher as well, since e-mail is asynchronous and does not occur in real time, and the delay in responding hinders understanding and precludes easy clarification or misinterpretations from being corrected. As a result, even minor misunderstandings become magnified and take far greater time and care to correct, further hindering the free-flowing nature of strong and vibrant relationships.

HOW TELEWORK IMPACTS ORGANIZATIONS

Positive Impacts on Organizations

From an organizational perspective, telework offers a number of advantages. First, telework has been reported to decrease absenteeism (Bailey & Kurland, 2002). Since

teleworkers can better accommodate family needs yet still accomplish work activities, teleworkers are less apt to be absent from work or to take time off in order to meet family needs. For instance, a teleworker may have a sick child at home who needs intermittent care for a day, yet the teleworker can still work quite productively from home and would otherwise be forced to be absent from work. Other personal and family-based needs can be more easily accomplished, such as taking a child or elderly parent to a medical appointment requiring just a short amount of time, but which otherwise would require taking an entire day off. Employees themselves who might fall ill or otherwise not feel well enough to endure a commute and the restrictions of being in an office can still accomplish vital tasks from home. In this way telework appears to decrease employee absences and positively impact the organization.

Telework is also reported to reduce organizational expenses. Since individuals who telework are generally in the office only some of the work week, less office space is required and fewer overhead costs are incurred. Employee offices for teleworkers can be smaller, shared between individuals, or even eliminated all together. In a few wellpublicized articles, IBM saved millions of dollars in office real-estate costs, eliminating office space due to the implementation of a large telework program. The cost savings due to saved real estate was particularly noteworthy among its sales force, in which entire buildings of corporate office space was saved as the sales force became based out of their homes. Moreover, from the corporation's perspective, individuals who telework tend to incur fewer overhead expenses due to the location of their work at home. They require less electricity, heat, air conditioning, and office supplies.

Perhaps the most-often cited benefit of telework for organizations is increased productivity, quality, and responsiveness of employees (Korte & Wynne, 1996; Nilles, 1994; Piskurich, 1998). Although these assertions are largely based on self-reported data from companies that have implemented telework programs, these benefits point to the eagerness with which employees endorse telework and the reciprocal benefits derived by the organization. Organizations report teleworker productivity is increased due to saved commute time and greater focus achieved by employees and that teleworkers are more efficient in the use of their time. Moreover, teleworkers are able and more willing to provide increased quality of service to customers, particularly during nonstandard or after-hours periods, due to the ease with which teleworkers can conduct their work away from the central office. With less self-sacrifice required of individuals due to their ability to telework, corporations are able to reap the benefits of greater employee responsiveness and enhanced flexibility to better meet customer and business requirements.

Organizations engaged in global business operations are particularly able to harness the benefits of telework's flexibility. Given the variation in time zones, telework offers employees the ability to carry out important tasks more conveniently when they occur outside of traditional work hours. With a greater willingness to take early-morning or late-night conference calls or attend virtual meetings, global corporations therefore achieve better business results due to enhanced communication, greater continuity in development and operations activities, and more satisfied employees who feel less imposed upon than if they had to conduct these activities from the corporations' office. Particularly in 24-hour continuous software-development projects, in which tasks are begun in one time zone, and then passed off to employees in successive locations around the world before returning to the original time zone the next day, telework offers irreplaceable flexibility to carry out essential global operations. As global development and manufacturing operations continue to increase, telework's role in facilitating enhanced continuity and communications is apt to grow accordingly.

Telework has also been found to increase corporate retention and reduce turnover rates, while also attracting employees who might otherwise be unable or unwilling to relocate. A few studies have found that telework reduces turnover. These studies suggest that the more hours individuals telework, the less likely they are to leave the company (Golden, 2006a). The rationale is that individuals who choose to telework more extensively experience enhanced freedom and flexibility to carry out work and nonwork activities as they see fit and remain highly satisfied with this work arrangement. This results in less of a desire to leave the organization. Corporations view telework as a tool to increase the attraction and retention of valuable employees, providing a means to reduce recruitment and retention costs while increasing employees' satisfaction and quality of life. The recruitment benefit is especially applicable to corporations' efforts to hire individuals who are not geographically mobile and cannot relocate because of family ties or a spouse's job. Corporations in these instances are able to hire valued employees with needed skills who would otherwise be precluded from employment. These advantageous hiring practices have been reported in studies not just in the United States and Europe, but also in Australia, where geographic distances prevent regular commutes to a corporation's office.

The literature on telework has also reported that corporations derive greater business continuity from telework in the event of unplanned or planned interruptions (Roitz & Jackson, 2006). Unplanned interruptions may be due to natural disasters or severe weather such as earthquakes, blizzards, or hurricanes in addition to tragic acts of terrorism. By enabling employees to continue to work from widely geographically dispersed locations, telework allows corporations to continue to operate and carry out essential business functions without geographic limitations. Planned disruptions include those such as continued operations during the Summer Olympics in Atlanta, in which businesses facilitated international attendance at the Olympic venues by avoiding employee travel to and from work. Examples

of the business continuity benefit from telework in the business press have spurred increased interest and study in this aspect of telework, generating additional attention and research.

Finally, telework provides corporations with a means to meet federal compliance with air-quality standards and the 1990 Americans with Disabilities Act. By reducing employee commutes, telework decreases the overall trips and miles traveled by employees and the percent of peakhour vehicle miles traveled measured by Federal Highway Administration. By reducing auto emissions, corporations are able to comply with air-quality standards and promote a positive public image as an environmentally friendly corporation. In terms of aiding compliance with the 1990 Americans with Disabilities Act, telework provides the opportunity for corporations to obtain valued skills from individuals unable to travel regularly to corporate offices due to physical disabilities.

Negative Impacts on Organizations

Perhaps the chief disadvantage noted by corporations with telework programs is the additional drain on managerial time and energy. Supervising teleworkers requires new management styles and additional effort in comparison to more traditional methods, and telework has been reported to breed managerial resentment (Vega, 2003). Managers complain that they cannot manage "those they can not see," and telework introduces additional burdens in the form of employee supervision. Instead of being able to more easily observe employee behaviors on the job, managers supervising teleworkers must cope with fewer observational opportunities and learn to manage based on results rather than effort. Research suggests managers fear losing control, and the reduction in face-to-face interactions with teleworkers breeds managerial insecurities. Extra effort is also required to ensure teleworkers remain an integral part of the manager's work unit. Managers must overcome the separation and communication challenges, which necessitates additional time and energy that the manager could otherwise spend on achieving work milestones.

Similarly, corporations must also devise and implement additional policies with regard to teleworker performance appraisals, pay systems, and liability. In reaction to managerial concerns about decreased observational opportunities in which to judge performance, corporate policies and additional training are required to implement fair and unbiased performance appraisals that do not penalize the teleworker. In effect, performance appraisals of teleworkers require careful guidance to preclude intentional and unintentional biases and maintain rewards for productive employees. In conjunction, the pay systems may also have to be revised, depending on if the teleworker is a clerical or professional-level employee. While some clerical tasks are easily quantifiable and objective, judging many professional-level positions involves significantly more care and discretion.

In terms of policy implications for liability concerns, telework may require additional employee legal agreements and greater involvement from the legal and human resource staff. For example, workplace injuries that occur while teleworking have been the subject of legislative debate, and the implications of such legislation remain partially unresolved.

There is also evidence that telework may be associated with decreased organizational identification on the part of teleworkers, suggesting that teleworkers do not view themselves as much a part of the organization as non-teleworkers. In a study conducted by Wiesenfeld, Raghuram, and Garud (1999), teleworker's electronic communication was a critical predictor of organizational identification, such that the more teleworkers remained electronically connected to others in the organization, the more they felt a part of the organization. Since teleworkers are away from the office and have fewer visible reminders of their membership in the organization, when they telework extensively, they appear to identify less with the organization. If indeed they tend to view themselves more as independent workers or contractors, teleworkers may be more prone to experience decreased loyalty to the organization or less willing to help in times of need. While additional research is needed to verify this possibility, organizations may need to exercise greater caution to avoid these possible teleworker sentiments.

Literature also suggests that corporations may experience reduced camaraderie and increased coworker resentment as a result of telework (Vega, 2003). The displacement of teleworkers from the office reduces social interactions and chance proximal encounters that foster employee friendships and esprit de corps, which may have a negative impact on morale particularly among those who remain in the office and do not telework. Non-teleworking coworkers may resent not having the freedom and flexibility offered by telework and harbor ill-will toward those who telework. Nonteleworking coworkers may also have to pick up the "slack" or carry out additional tasks due to teleworkers' absence from the office. For instance, non-teleworking coworkers may need to assume additional duties on days when the teleworker is out of the office or carry out short-notice assignments that cannot wait until the teleworker returns. By reducing commaraderie and fostering possible sentiments of resentment between teleworkers and non-teleworkers, telework programs may hurt overall unit effectiveness.

Data and information security is also a large corporate concern with telework. Since teleworkers tend to work at home and away from corporate controls, there is an increased risk of the loss of sensitive data and propriety information. Documents may get lost or misplaced, the disposal of sensitive corporate information may not follow corporate standards such as shredding, and proprietary information is more vulnerable to exploitation. As several well-publicized cases have shown, even the misplacement or stealing of laptops brought home with teleworkers containing customer data poses significant additional risk to the company, its image, and its customers. Additionally, remote access

to corporate databases introduces greater risk of hacking, computer viruses, and other unauthorized access.

Research has also noted the corporation's additional costs due to equipping teleworkers (Bailey & Kurland, 2002). Teleworkers generally require computers, printers, high-speed data connections, and other office equipment such as phone lines or copiers, which can be costly for corporations to provide, especially when these costs are in addition to those incurred for the individual's corporate office. While some costs due to saved office space may be realized, particularly if telework is full time, when telework is conducted during part of the week as is the most common practice, corporations m ay incur additional costs. These costs include not only equipment and software, but also greater resources in terms of training and other technology support services.

Finally, telework can be disruptive to the organization's culture and require significant management investment to bring about the cultural shift necessary to ensure telework's success. This paradigm shift is important not just for the teleworkers themselves, but also for coworkers, managers, customers, and the whole range of other organizational stakeholders. This shift may be particularly challenging, because it affects not only the teleworkers, but also those back in the office. In bringing about the cultural shift, changes are needed in such basic ways as how the organization communicates to its employees, how it socializes newcomers, and the manner in which it conducts on-the-job training. With sufficient upfront investment, however, these cultural obstacles cane generally be overcome.

THREE KEY CONSIDERATIONS IN UNDERSTANDING THE NATURE OF TELEWORK'S IMPACT

With the wide-ranging implications of telework for both the individual and the organization, finding the right balance between advantages and disadvantages can be a significant challenge. On the one hand, research suggests that telework offers significant benefits for both the individual and organization. On the other hand, telework offers significant drawbacks that adversely impact both the individual and the organization. Clearly, tradeoffs must be made that account for both benefits and drawbacks when implementing telework programs. Yet, the effective balancing of tradeoffs appears to require accounting for other considerations as well.

Telework research initially compared teleworkers to non-teleworkers; however, this simple comparison appears to have overlooked several crucial aspects of telework that highly influence its impact on important work outcomes. Emerging research suggests that at least three key considerations are important to understanding the nature of telework's impact. As discussed next, these include the extent to which an individual teleworks, the nature of the individual's job, and the individual's personality.

Extent of Telework

Recent telework research has begun to investigate the extent to which individuals telework as a key influence that is important to understanding the nature of telework's impacts. Although most individuals telework for only part of the week, the extent to which they do so varies significantly. For instance, an individual may choose to telework only 5 hours per week, while another may telework 35 or more hours per week. The impact of such differences on important work outcomes is apt to be substantial.

For example, several studies have recently investigated how the extent of telework affects job satisfaction (Golden, 2006b; Golden & Veiga, 2005). Rather than creating a linear relationship, however, these studies suggest that job satisfaction varies in a curvilinear manner with the extent of telework. The change in job satisfaction as a function of the extent of telework varies in the shape of an inverted U-shaped curve, such that job satisfaction initially increases as the extent of telework increases, but then decreases at more extensive levels of telework. In essence, it appears that job satisfaction is maximized at moderate levels of telework (generally about 15 hours per week). Job satisfaction is lower, however, for individuals who telework either more extensively (22 hours per week) or less extensively (7 hours per week).

In another recent study, conflict between an individual's work and family life was investigated as a function of the number of hours per week they spent teleworking away from the company office (Golden, Veiga, & Simsek, 2006). This study involving almost 450 teleworkers in a large corporation found that the extent of telework differentially impacts how work impacts family and how family impacts work. Work-to-family conflict was found to be diminished for those who teleworked more extensively, while familyto-work conflict was found to be greater as telework levels increased. The impact of telework was also found to be influenced by the nature of the individual's job and family situation. Most importantly, the study's findings highlight the careful balance that must be achieved when teleworking or implementing telework programs. While teleworking more may be beneficial in some respects, it may also be detrimental in others.

The extent of telework has also been investigated recently in terms of its impact on work exhaustion, turnover intentions, and organizational commitment (Golden, 2006a). More extensive telework has been associated with decreased work exhaustion, suggesting that telework helps alleviate exhaustion by helping people achieve better balance in their lives and reducing the energy required to meet obligations. It may be that working from home part of the week enables individuals to replenish their energy levels, while facilitating their ability to better accommodate both work and family demands. Reduced exhaustion has also been found to be related to an individual's commitment to the organization and his or her intention to leave it. More specifically, as individuals telework more extensively, their

commitment to the organization tends to increase, and their desire to leave the organization for another job decreases. While more research is necessary before definitive answers can be made, these results again suggest that the extent of telewok may be a crucial factor in determining the appropriate level of balance required to ensure telework's success.

Nature of the Job

The nature of an individual's job and the type of tasks performed highly influence the impact of teleworking. Early research on telework focused on clerical workers, where tasks were highly defined and impacts to work outcomes could be easily measured. These studies tended to investigate hourly workers conducting administrative tasks such as call-center or clerical employees. These employees have very little discretion over their job duties or how to conduct work tasks. These types of jobs were also more easily monitored by managers, who could oversee interactions with customers during phone calls and measure changes in output similarly to when work was conducted in the central office. Generally speaking, results of these studies showed that telework helped individuals feel more satisfied with their jobs and achieve better balance in their lives in terms of work and family than if they remained in the central office full time.

More recently, telework research has begun to investigate its impacts on professional level workers engaged in more complex tasks. This research suggests that the nature of the job tasks themselves is highly influential in determining telework's impacts (Raghuram, Garud, Wiesenfeld, & Gupta, 2001). For instance, research has investigated the degree of scheduling latitude individuals have in their jobs and how this influences important individual work outcomes such as job satisfaction. In these studies, individuals who teleworked extensively and had greater freedom and flexibility in the scheduling of work tasks experienced enhanced job satisfaction in comparison to those who had less latitude. Other job attributes have also been investigated, such as the degree of interdependence teleworkers have with others in order to carry out job tasks. In these studies, individuals who telework extensively and have lower task interdependence tend to experience higher job satisfaction compared to those with higher interdependence. Based on this research, it seems that teleworkers who are less dependent upon others to conduct their work are able to enjoy the most benefit from telework in terms of enhanced job satisfaction. As these results indicate, more research is needed in this area.

Personality Characteristics

Research is also beginning to explore the role of individual differences in personality in influencing telework's impact. This research suggests that individual personality characteristics are highly influential in determining the nature and extent of impact telework has on work outcomes.

For instance, if an individual has a strong need for social interaction yet teleworks extensively, feelings of detachment and frustration are apt to be severe, detrimentally impacting important work outcomes. These individuals are less apt to be satisfied with their jobs, particularly if they telework extensively. Such individuals enjoy talking with others, tend to have a vibrant social life, and may not be used to working independently. As a result, if they are put in situations in which they must telework, they are less apt to be content with this work arrangement and more likely to experience feelings of isolation and being cut off from others in the central office. In contrast, an individual who is introverted or enjoys being alone may derive significant personal benefit and satisfaction from working away from others. For these individuals, telework offers the opportunity for less face-to-face communication and personal interaction with others, which they may find very personally fulfilling.

Research is also suggestive that other personality characteristics may influence telework's outcomes, such as individual need for control or autonomy, need for affiliation, and centrality of work in one's life (Wiesenfeld, Raghuram, & Garud, 2001). Individuals with a greater need for autonomy are apt to enjoy the freedom and flexibility offered by telework as a means to gain greater independence in the manner in which they conduct themselves at work. By separating themselves from others and the central office, these individuals gain greater autonomy over when and how job tasks are accomplished, and therefore achieve enhanced personal satisfaction. Similarly, individuals with a high need for affiliation may be somewhat frustrated at the inability to emotionally connect with coworkers. These individuals may experience greater frustration at the separation and distance imposed by telework. Moreover, individuals who have a higher tendency to be "workaholics" may find telework troubling, as boundaries between work and home are blurred, which can lead to a higher propensity to work longer hours and an inability to detach from work demands. Although research on personality characteristics among teleworkers has begun to shed insights, clearly much more remains to be done before such suggestions indicated by existing research can be confirmed.

TELEWORK IMPLEMENTATION AND SUGGESTIONS FOR SUCCESS

As the previous research summary suggests, there appears to be an inherent balance required in telework to account for its many implications for the employee and organization. While clearly many potential benefits exist, these must be taken into account considering the potential negative impacts to this way of working. Although research is still emerging and any conclusions must remain tentative pending further study, several observations can be made that may be useful for employees and organizations.

First, although telework is not a panacea, it does seem to offer a number of advantages over traditional work modes when conducted at moderate levels. Based on existing literature, greater advantages and fewer disadvantages seem to be realized when telework is conducted during a portion of the work week, perhaps around 15 hours. Moderate levels of telework may provide individuals with desirable levels of flexibility and autonomy without also incurring more detrimental impacts such as isolation and feeling cut off from others in the office. Additionally, telework during part of the week may offer individuals a relief from the regular routines of office life and its associated stressors, while also providing an opportunity to rejuvenate energy and obtain a needed break from draining commutes. When practiced in moderation, it may also enhance the quality of work life such that individuals are more satisfied in their jobs and less likely to leave the organization. Organizations in turn benefit from greater employee loyalty and commitment to work, garnering more dedicated employees who enhance productivity.

Second, perhaps the primary reason many individuals choose telework is to better manage work and family demands, and in this regard a balance also appears to be needed. Teleworking appears to allow employees to better manage family responsibilities, since existing research suggests that telework decreases work's impact on family. However, research also suggests that telework increases family's impact on work, so careful attention must be paid to managing the boundary between work and family. More specifically, telework research suggests teleworkers need a separate and dedicated workspace in their home that is away from distractions and insulated from the temptations inherent in the home domain. Teleworkers need to ensure family members refrain from undue interruptions and respect the physical and emotional boundaries erected by the teleworker to concentrate on work tasks. Moreover, organizations can facilitate the institutionalizing of telework by enacting telework agreements with individuals, making work arrangements and agreed-upon procedures explicit to avoid confusion and misunderstandings.

Third, while isolation may be a primary drawback of telework, both individual and organizational efforts need to be made to enhance contact and social interaction between teleworkers and those in the office. Based on research consistently noting the isolating effect of telework, increased efforts need to be made to foster informal exchanges between teleworkers and coworkers. While this effect appears to be less severe when telework is practiced at less than extensive levels, high levels of communication containing both task and relationship-building interactions appear to be crucial in sustaining positive teleworking experiences. These interactions can take place during regularly scheduled face-to-face meetings and informal gatherings, but need to include sufficient levels of socioemotional interaction to sustain and build important relationships with coworkers, managers, and others.

Finally, teleworking appears to require alternative management techniques, necessitating newer control mechanisms, additional training, and fresh forms of assessing actual work-related contributions. Managers of teleworkers need to be cognizant of the need to employ techniques that harness the benefits of employee flexibility, measuring quantifiable results and actual contribution rather than inordinately weighing more traditional indicators such as face-to-face time and hours worked. By instituting training programs that set realistic expectations and methods for ensuring frequent and rich interactions between the teleworker and others, pitfalls of telework may be avoided or minimized. Through careful note of the research summarized here and that which is emerging, thoughtful teleworkers and their managers may be able to maximize the potential of telework, providing improved individual and organizational effectiveness.

REFERENCES AND FURTHER READINGS

- Allen, D. G., & Renn, R. W. (2003). The impact of telecommuting design on social systems, self-regulation, and role boundaries. Research in Personnel and Human Resource Mangaement, 22, 125–163.
- Bailey, D. E., & Kurland, N. B. (2002). A review of telework research: Findings, new directions, and lessons for the study of modern work. *Journal of Organizational Behavior*, 23(4), 383–400.
- Cooper, C., & Kurland, N. B. (2002). Telecommuting, professional isolation and employee development in public and private organizations. *Journal of Organizational Behavior*, 23(4), 511–532.
- Golden, T. D. (2006a). Avoiding depletion in virtual work: Telework and the intervening impact of work exhaustion on commitment and turnover intentions. *Journal of Vocational Behavior*, 69(1), 176–187.
- Golden, T. D. (2006b). The role of relationships in understanding telecommuter satisfaction. The *Journal of Organizational Behavior*, 27(3), 319–340.
- Golden, T. D., & Veiga, J. F. (2005). The impact of extent of telecommuting on job satisfaction: Resolving inconsistent findings. *Journal of Management*, *31*(2), 301–318.

- Golden, T. D., Veiga, J. F., & Simsek, Z. (2006). Telecommuting's differential impact on work-family conflict: Is there no place like home? *Journal of Applied Psychology*, 91(6), 1340–1350.
- Guimaraes, T., & Dallow, P. (1999). Empirically testing the benefits, problems, and success factors for telecommuting programmes. *European Journal of Information Systems*, 8(1), 40–54.
- Hill, E. J., Miller, B. C., Weiner, S. P. & Colihan, J. (1998). Influences of the virtual office on aspsects of work and work/life balance. *Personnel Psychology*, *51*(3), 667–683.
- Korte, W. B., & Wynne, R. (1996). *Telework: Penetration, potential and practice in Europe*. Amsterdam: IOS Press.
- Kossek, E. E., Lautsch, B. A., & Eaton, S. C. (2005). Telecommuting, control, and boundary management: Correlates of policy use and practice, job control, and work-family effectiveness. *Journal of Vocational Behavior*, 68(2), 347–367.
- Kurland, N. B, & Cooper, C. D. (2002). Manager control and employee isolation in telecommuting environments. *Journal of High Technology Management Research*, 13(1), 107–126.
- Nilles, J. M. (1994). Making telecommuting happen: A guide for telemanagers and telecommuters. New York: Van Nostrand Painhold
- Piskurich, G. M. (1998). An organizational guide to telecommuting: Setting up and running a successful telecommuter program. Alexandria, VA: American Society for Training and Development.
- Raghuram, S., Garud, R., Wiesenfeld, B., & Gupta, V. (2001). Factors contributing to virtual work adjustment. *Journal of Mangement*, 27(3), 383–405.
- Roitz, J., & Jackson, E. (2006). AT&T adds business continuity to the long list of telework's advantages. *Journal of Organizational Excellence*, 25(2), 3–12.
- Vega, G. (2003). *Managing teleworkers and telecommuting strategies*. Westport, CT: Prager Publishers.
- Wiesenfeld, B. M., Raghuram, S., & Garud, R. (1999). Communication patterns as determinants of organizational identification in a virtual organization. *Organization Science*, 10(6), 777–790.
- Wiesenfeld, B. M., Raghuram, S., & Garud, R. (2001). Organizational identification among virtual workers: the role of need for affiliation and perceived work-based social support. *Journal of Management*, 27(2), 213–229.

ELECTRONIC MONITORING OF PERSONAL WEB USE AT WORK

MICHEAL T. STRATTON

Hood College

echnology has transformed the workplace. Since the inception of the Internet, the benefits for organizations and its stakeholders have altered the way work is conducted, managed, and controlled. From service delivery and quality control to alternative communication channels, the Internet has and will continue to impact organizations on many levels. The steady growth of personal Web usage (PWU) at work (Mahatanankoon, Anandarajan, & Igbaria, 2004), for example, has become particularly interesting and relevant to scholars and practitioners in management and organization studies. With its presence at the center of operations inside organizations, the Internet has resulted in a number of by-products, including PWU. Also known as "cyberloafing," many scholars and practitioners contend that this has become the new form of workplace misbehavior.

In the past, managers were once concerned with personal telephone calls, water-cooler chat, or other types of shirking behavior that were believed to have adverse effects on productivity. The savvy computer users of the new generation are now able to engage in personal work at work in a more immediate and perceived private fashion using the Internet for e-mail, instant messaging, social networking, and blogging. Growing up in the age of cell phones, text messaging, and digital audio and video technologies, many from this new generation expect Internet availability and continuous connectivity at home and at work. In many cases, the meshing of work and personal lives has created an environment where Internet use is a tacit necessity. These expectations present significant challenges for managers and leaders now

and in the coming years and decades. For example, the potential network security, legal, and fiduciary vulnerabilities associated with some forms of PWU place the organization at considerable risk. While PWU is a tool for users to bridge their personal and professional worlds, organizations are now taking action to curb such behavior, including the use of policy and surveillance technologies.

Given that many organizations define PWU as rule breaking or misbehavior, it is not surprising to find that decision makers are utilizing electronic monitoring systems to observe and control this particular behavior. While the technology is new, the assumptions underlying the use of monitoring in the workplace reflect the thinking of management practitioners and scholars from the beginning of the last century, including the father of modern management, Frederick Taylor. From the shop floor to the cubicle, individual agents have been labeled as self-interested, rational actors whose behavior must be controlled by the principal (i.e., the organization) to ensure compliance to the organizational agenda. In response to management action, studies (e.g., Lim, 2002) have shown that employees often view monitoring as intrusive, invasive, and a symbol of distrust.

For managers in the new workplace, the choice to monitor PWU activity will require close examination of the multiple factors that contribute to user compliance and defiance behaviors. Therefore, the purpose of this chapter is to introduce students of organizational studies to a conceptual framework for understanding and exploring the antecedents and consequences associated with monitoring behavior in this new workplace context.

MONITORING AS A TOOL FOR MANAGERIAL CONTROL

From stealing and corruption to bullying and sabotage, the types of deviance happening inside organizations today are vast and costly. It is apparent from media reports and anecdotal accounts that misbehavior, in its variety of forms and intensities, is indeed a reality for many, if not most, organizations. However it is defined or conceptualized, misbehavior often has serious consequences for the individual(s) committing the act, the intra- and interorganizational stakeholders (e.g., coworkers, citizen-customers, partnering firms/agencies, investors, etc.), and overall society. External pressures, such as industry standards and legal mandates, along with those from the inside, such as declining profits and inefficiencies, often pressure managers to curtail misbehavior within the confines of the organization. Whether it is shirking or other types of withholding effort, controlling employee behavior has long been a theme guiding the study and practice of management. In an effort to identify and decrease employee misbehavior, organizations use a variety of oversight tools, including surveillance technologies.

Monitoring has become an integral part of the control and coordination aspects of the managerial role. In the modern workplace, traditional supervisory observance is being accompanied or altogether replaced by electronic performance monitoring. The latter allows for continuous observance of employee performance data with or without the knowledge of its existence by those under surveillance. This differs greatly from the direct nature of overseeing employee behavior by those in positions of authority and close proximity to the tasks being conducted (e.g., shift supervisors). The electronic monitoring is used to collect information on a wide range of employee behavior related to task performance that may otherwise be unobservable to direct supervision. Some examples include audio-technology telephone monitoring in call centers and geographic positioning systems (GPS) and video surveillance (Alder & Ambrose, 2005).

The Economic Argument

In organization studies, a variety of perspectives support and criticize monitoring and its influence on the work, worker, and workplace. In particular, the study of labor and behavioral economics largely assumes that in order to control behaviors that are neither business-related nor productive to the organization, management must employ monitoring technologies as a disincentive mechanism to discourage such behaviors. Surveillance, whether it is electronic or the visible presence of a supervisor, provides management with an additional set of eyes. The employees, aware of the monitoring, decrease their shirking behavior because of the adverse consequences of being caught (i.e., probation, loss of extrinsic incentives, termination, etc.). As an information tool, the monitoring allows the employer to gather production- or nonproduction-based data on employee behavior. In turn, as per the economic argument, the rational, utilitymaximizing worker will be discouraged from continuing to engage in the observable behavior. These assumptions are largely grounded in the neoclassical economic tradition of Agency Theory and are extended in transaction cost economics (Williamson, 1985). Both schools of thought argue, among other things, that monitoring can protect the principal in situations where agents are in breach of the employment contract by engaging in shirking or opportunistic behavior.

In Agency Theory, the assumption is that the mutually agreed-upon employment contract will bind the employee to engage in behavior that is in line with organizational demands. When management is able to collect information on employee performance, the employee is more likely to comply with policies and rules guiding the task at hand. However, given that employee behavior is sometimes unobservable, many economists argue that employees will decrease effort to better their own individual utility. Hence, the monitoring can act, in concert with incentive programs, as a deterrent force against such opportunistic behavior. The monitoring technologies become the eyes and ears of management, and it is assumed that agents will rationally respond by complying with the terms of the employment contract.

Williamson (1985) contends that agents are not only opportunistic, as argued in Agency Theory, but are also "boundedly" rational. Essentially, the agent has multiple goals, both personal and professional, which may be contrary to the economic, rational interests of the firm (i.e., efficiency concerns). The organization, from this perspective, should therefore be aware that employees cannot be trusted and, as such, the expected misbehavior should send a signal to organizations to prepare accordingly. As the employment relationship plays out, organizations should develop governance structures, which can be in the form of surveillance tools to ensure compliance with the contract. Electronic performance monitoring, for example, may act as a disincentive for the potentially deviant actor. In line with the assumptions of Agency Theory, as the principal gains more information on agent performance, any attempts to misbehave by the agent will likely decrease. For the agent, minimizing behavior will help to compensate for the costs associated with possible consequences such as dismissal or loss of bonus income. The opportunistic behaviors are kept in control with an eye on what is happening on the shop floor. Therefore, principals become aware of any opportunistic behavior that may jeopardize the employment contract.

In a recent economic study, Nagin, Rebitzer, Sanders, and Taylor (2002) explored the relationship between monitoring and worker effort by observing how a variation in monitoring at a telephone call center influenced opportunistic behavior. The authors gained access to a large telephone solicitation company, with various dispersed call centers, and explored both production and worker attitudes. When suspicious bad calls (i.e., those where call-center employees falsely reported that they had solicited customer funds) were reported to employees and their shirking was revealed, the authors found

that employees would halt their misbehavior. Conversely, when monitoring was seemingly nonexistent to the call-center staff, but secretly in place by management, opportunistic behavior remained. The economic perspective, and many corresponding studies, portrays monitoring as a positive force for organizations to control employee behavior.

Social Information Processing Theory

Current research calls into question the economic modeling of human behavior in employment relationships. The aforementioned perspectives have come under fire from those who wish to expand on the understanding of behavior beyond the cost-benefit, rational-actor assumptions. Scholars such as Stanton (2000) and others apply the Social Information Processing Theory when examining the influence of monitoring on employee behavior. Stanton argues that monitoring is an effective tool because it sends signals to employees that their misbehavior is out of sync with the organizational culture that defines expectations for appropriate behavior. The monitoring sends social cues to employees about what they should or should not do given the norms and values inherent to that culture. After experiencing the monitoring, such as receiving feedback from the system regarding their task performance, employees will make sense of this experience and behave in accordance with the policies and procedures guiding appropriate

Stanton and Julian (2002) found that electronic performance monitoring could act as a virtual supervisor by directing employees' attention to the specific aspect of the monitored task. Their experimental study suggests that employees interpret the target under observation (e.g., performance output in the form of quality or quantity) as a priority and adjust their behavior accordingly. Essentially, when quality is monitored more so than quantity, they found that employees were more focused on the quality of task performance. The monitoring sent implicit messages about what is important and unimportant with regard to performance behaviors.

Monitoring, therefore, can be an effective control tool for management because of the social pressures placed upon employees to comply with expectations. This perspective is somewhat complementary to the economic argument. While it recognizes that employee decisions to comply may be due to the disincentives and opportunity costs for nonconforming behavior, such decisions are also reflective of the social cues embodied in the monitoring and feedback provided to employees.

THE NEW AGE OF ELECTRONIC SURVEILLANCE: MONITORING PERSONAL WEB USAGE

Bringing together information technology with most aspects of work life has created an environment where new

forms of misbehavior and types of surveillance are emerging in the modern organization. Monitoring that specifically observes Internet activities, including Web surfing, e-mail, instant messaging, and file sharing has become commonplace in workplaces within the United States and abroad. It is important to note that there is a considerable difference between the previously discussed electronic performance monitoring and new PWU-based surveillance (Urbaczewski & Jessup, 2002). While both exist to observe employee behavior, the former is focused specifically on employee task performance and often results in targeted feedback and suggestions for enhancing that performance. However, the latter type of monitoring, which is the focus of this chapter, exists to ensure compliance with specific policies regulating Internet activity in the workplace. Although some may argue that PWU-base monitoring is designed to expose unproductive employees, the overarching design and implementation of this particular type of surveillance focuses solely on logging and reporting unauthorized Internet usage.

The PWU Trend in Today's Workplace

The Internet has created a playground for users to do personal work at work; employees are now able to cross the boundaries of their work and personal lives to engage in a variety of activities, including financial, family, and leisure. In organizations that offer Web access to employees and managers, PWU has become second nature for users and often problematic for employers. In a recent study, Anandarajan and Simmers (2004) found that PWU activity is multidimensional and can be categorized based on its severity of impact on the organization. For example, some forms of PWU are described as disruptive, such as visiting pornographic or gambling Web sites or exchanging inappropriate e-mails between friends or coworkers. At the other side of the spectrum, employees often engage in recreational and personal-learning usage, which might include planning trips and inquiring into education opportunities. Regardless of the type of Web sites visited or related Internet activity, many organizations define PWU as rule-breaking misbehavior. In addition, recent studies have shown that this new form of misbehavior is on the rise.

In the private, public, and nonprofit sectors, PWU has become the norm. Studies in the information security industry, such as the collaborative survey by the Computer Security Institute (CSI) and the Federal Bureau of Investigation (FBI) (Richardson, 2007), have found that employers are reporting abuse of Internet privileges at work. One of the central themes in this report is insider abuse of network access, which includes simple policy violations such as PWU. The most recent survey found a 17% increase, from 42% to 59%, in organizations reporting insider abuse of Net access since the previous study.

Various media outlets and oversight bodies in the federal government have exposed two very prominent examples of this increase in PWU. Both the Internal Revenue Service (IRS; Milbourn III, 2003) and the Department of the Interior (DOI; Devaney, 2006) have come under scrutiny for excessive cyberloafing by their employees. With respect to the IRS, an audit conducted by the Treasury Department found that during a 7-day period, employees were found to use e-mail and the Internet for more than 8,000 hours for nonbusiness purposes. At the DOI, a more recent audit by their Inspector General reported that employees spent over 2,000 hours in the course of 1 week visiting gambling and auction Web sites. Frequent visits to sexually explicit and gambling Web sites were also indicated in the report. These findings are consistent with industry surveys, which suggest that both public and private organizations are vulnerable to this new form of personal work at work.

Why Is PWU Problematic for Organizations?

Select scholars and practitioners contend that some forms of PWU may actually be beneficial to the individual and organization (e.g., Anandarajan & Simmers, 2004; Mahatanankoon et al., 2004), such as using the Internet as a learning tool (i.e., educational Web sites and current events), to reduce stress or for balancing work-life demands. Nevertheless, decision makers are concerned with the intentional or unintentional adverse effects of PWU on the organization and its stakeholders. Specifically, PWU may create vulnerabilities for the legal, financial, and data-security interests of the organization.

With respect to the legal aspects of PWU, employees may purposely or inadvertently download or distribute pirated software, audio, or video files. "Softlifting" is a form of piracy that involves sharing and copying software onto other computers contrary to the negotiated license agreement. A copyrighted file or software program downloaded or distributed via the organization's internal network or its mere presence on the computer system is often considered copyright infringement. In addition, employees may use the Internet at work to transmit sexually explicit or inappropriate messages to other employees, which may offend the recipients and result in sexual harassment or discrimination lawsuits.

Even seemingly innocent acts of PWU can result in potentially harmful results for the organization. In some cases, visiting certain Web sites may open the door to hackers or viruses that could place the data on the network at risk for attack or manipulation. This is a considerable concern for health-care and financial industries, which are regulated by federal laws to protect the information on its network. Both the Health Insurance Portability and Accountability Act (HIPAA) and the Gramm-Leach-Bliley Act require organizations to ensure that customer-citizen data are secure and confidential. Many organizations, due to the pressures associated with these laws, institute policies and monitoring technologies to protect the network from unauthorized access or malicious attacks.

In addition to legal and data-security concerns, many managers view PWU as time-wasting activity that could

have an indirect impact on the bottom line. A recent Salary.com survey (Malachowski & Simonini, 2006) reported that PWU, cited as the top time-wasting activity in the workplace among survey respondents, contributes to billions of dollars worth of lost productivity in the domestic economy. The 2006 study reports that 52% of respondents cited PWU as their top time-wasting activity at work, which is an increase 7% from the previous year. On average, employees admitted to 1.86 hours per day of time-wasting activities, including PWU. On a related note, downloading legally purchased audio or video may adversely affect the network and cause the system to slow down. This loss of bandwidth capacity could then disable or hamper business-related Internet activity, which may create inefficiencies for business operations.

PWU-Based Monitoring Technology

The risks associated with PWU have prompted organizations to take proactive actions to mitigate any potential problems posed by personal Internet activity. In concert with policy statements and training, organizations are now employing electronic monitoring software to deter PWU and protect its network. The American Management Association (AMA; 2005) recently reported that 76% of those surveyed instituted electronic monitoring technologies to observe PWU-related activity, including e-mail and Web browsing.

While there are a variety of commercial software programs available to organizations, the primary function of the electronic monitoring is to observe and log behavior, along with the ability to generate usage reports (Urbaczewski & Jessup, 2002). The reports are usually customizable and can indicate the specific nature of the user behavior. This may include a list of Web sites visited, the frequency of visits, the time of the visits, and keyword searches in e-mail communication. In some cases, organizations often require users to log into the system, whether it is network or the Internet itself, once the computer is turned on. Therefore, these reports can link usage to specific users and/or groups of users in a particular business unit.

The monitoring system may also allow the organization to identify specific Web sites, or categories of Web sites, that can be deemed inappropriate based on organizational needs. Once identified, the information technology staff responsible for security can then block user access to these Web sites. The recent AMA survey found that 65% of the respondents used this blocking technology to disallow access to specific sites, which was a 27% increase from the previous study in 2001. While the blocking is a useful characteristic of PWU-based monitoring software, it may become bothersome for users in specific instances. Web sites that are deemed personal in nature, such as news, entertainment, or auctions may also be required for official business use. In this case, the end user or the information technology officials are often given override capabilities to permit access in such cases. The presence of such monitoring technology, along with coinciding policies and training, attempts to detect, prevent, and deter PWU misbehavior. A study by Mirchandani (2004), using similar assumptions underlying Agency Theory, found that monitoring could be a useful tool for identifying rule-breaking behavior. The monitoring discourages users from continuing PWU, because their acts are being tracked and communicated to those with the authority to punish misbehavior.

REACTIONS TO PWU MONITORING: COMPLIANCE OR DEFIANCE?

Numerous factors affect an organization's decision to institute electronic monitoring. While these antecedents contribute to our understanding of this unique context of monitoring, the consequences for those being monitored demand attention as well. Specifically, user reactions to the monitoring experience are important indicators of the effectiveness of this managerial control tool. Does the electronic monitoring encourage compliance with policies or does it result in an unintended consequence, such as user defiance? Recent research in organizational studies has revealed that user reactions to electronic monitoring, PWU-based or otherwise, are complex and often tied to individual-level factors, along with group- and organizational-level phenomena. The former will be the focus of this section.

As Spitzmüller and Stanton (2006) recently found in their study of user reactions to different types of monitoring, a number of determinants help explain the intention to comply or resist the monitoring and the messages inherent to that control tool. Along with other researchers, they conclude that attitudes toward monitoring play a significant role in determining user-response behaviors. This follows the assumptions of Ajzen's Theory of Planned Behavior, which contends that attitudes reflect our intention to behave. Toward developing a conceptual framework for understanding electronic monitoring in this particular context, three specific factors will be presented in this chapter. These include fairness perceptions, psychological contract assessment, and affective consequences associated with the monitoring (i.e., discrete emotions, stress, and well-being).

Fairness

When users' PWU activity is monitored, the degree to which they perceive that the monitoring is justly designed and implemented may influence their attitudes and corresponding behavioral response. For example, if the monitoring collects personal data on employees, which is likely the case in the PWU context (e.g., personal banking, e-mail content, vacation planning, etc.), users may perceive that the monitoring target is irrelevant to the interests of the organization. In an experimental study on computer surveillance, including PWU, Alge (2001) found that the relevance of the collected data had a negative effect on

privacy perceptions. If the monitoring collects data that are deemed private by the user, such as content from personal e-mails or the types of Web sites visited, this study suggests that the monitoring will be perceived as being procedurally unjust. In addition, this study points to the influential role of user participation in the monitoring design and implementation on privacy and fairness perceptions. Alge found that users who were able to voice their opinions and engage in the decision-making process (e.g., what data are collected and how the data are used) were more likely to view their personal data as being kept private and the monitoring as a fair tool for management. It is important to note, however, that while employees may have expectations for privacy when engaging in PWU, the organization is legally permitted to monitor activity on its network (Nord, McCubbins, & Nord, 2006). The Electronic Communications Privacy Act (ECPA) protects the organization and its decision to monitor employee communications to ensure authorized, legitimate information technology use.

Nevertheless, the fairness perception linked to privacy expectations is an important variable when considering user attitudes to monitoring, including employee satisfaction. Current research (Alder & Ambrose, 2005; Urbaczewski & Jessup, 2002) suggests that fairness perceptions associated with the privacy or design of the monitoring system affect employee satisfaction. Employee attitudes, such as satisfaction, have also been found to influence one's intention to behave according to the policies underlying the monitoring system. Spitzmüller and Stanton (2006) found that negative monitoring attitudes are more likely to result in defiant behavior, including continued misbehavior irrespective of the monitoring or attempts to bypass the controls altogether. In the PWU context, this may involve users sending personal e-mail through the organization's e-mail program, which may not be monitored, rather than using their Web-mail account that is under surveillance.

Psychological Contract

Using the framework of psychological contract theory, some contend that monitoring represents a symbol of distrust and disloyalty and may result in an array of adverse psychological effects for the employee. Economist Frey (1993) believes that the conventional wisdom associated with Agency Theory is one sided and too simplistic to accurately assess the complexity inherent to an employment relationship. More specifically, he makes the case that the stereotypical extrinsic-based employment contract must also take into consideration the psychological repercussions associated with monitoring activity.

He postulates that a psychological contract exists between the principal and agent, and therefore worker morale and motivation are dependent upon the employer's adherence to that contract. The crux of Frey's (1993) disagreement with Agency Theory is the disregard for this implicit contract. The terms of this agreement are based on mutual trust and respect, where the principal recognizes and ac-

knowledges the importance of worker feelings, attitudes, and ability to make sound decisions. He believes that when a stringent monitoring structure is developed and implemented, with the supposition that the agents are going to violate the explicit contract (i.e., shirk due to the opportunity costs associated with the working agreement), agents may perceive that the implicit contract has been violated. Essentially, the monitoring activity signals to the agents that the employer possesses some level of distrust for their activity, and therefore the agents' work morale is invariably reduced. The monitoring itself may be synonymous to a prenuptial agreement in a marriage. To most, a prenuptial agreement may send signals of distrust and anticipated contract breakdown. The monitoring may suggest a similar message to agents about the basis of a distrusting relationship with the principal. If agents perceive a violation in the psychological contract, they may indeed engage in destructive behavior such as a potential reduction in effort. For instance, applying the psychological contract framework to the context of PWU-based monitoring, individuals may interpret the monitoring as a source of discontent and react by increasing their personal use of the Internet irrespective of the existing surveillance.

Affectivity

Various aspects of an individual's experience can influence how one behaviorally reacts to a monitoring experience. The varying perspectives that explain the relationship between monitoring and behavior largely do not consider the affective side of human behavior. Whether employees adhere to the policy vis-à-vis the monitoring or defy the policy due to a perceived injustice or psychological contract breach, we may learn a great deal about the behaviors by understanding the emotional responses of those being monitored. Emotions often induce behavior; they are based on our interpretation of a particular event and guide how we react. If we can systematically examine how employees feel about their experiences with the monitoring, we can be better prepared to explain consequential behaviors.

Agency Theory and economic assumptions do not include emotions as relevant variables. Agents, according to these theories, are rational actors, and as such the models depicting behavior disregard any form of affective characteristic. However, understanding the relationship between monitoring and behavior can be greatly advanced by incorporating the role of emotions. For instance, when an agent is afraid of the monitoring because of possible consequences associated with shirking, such as suspension or termination, and ceases the shirking behavior, the rational explanation becomes clouded. The motivation for the responding behavior may be linked to the costs associated with the misbehavior being made known to management, but the emotional reaction that precedes the behavior is anything but rational.

Those who have provided alternative approaches to studying monitoring and behavior have also disregarded the potential explanatory power of emotions, including Stanton's (2000) conceptual model of employee reactions to monitoring. The model only briefly notes the existence of psychological arousal induced by the monitoring, but the explicit role of discrete emotions such as fear, anger, frustration, or pleasure are overlooked. For those who have considered the power of affectivity, research has shown that monitoring may have emotional consequences. Holman (2002), for example, found that electronic performance monitoring adversely affects employee well-being. This includes increases in anxiety, depression, and job dissatisfaction. Certain managerial activities, such as PWU monitoring, could actually produce toxic consequences, including frustration and anger.

In addition, perceived psychological contract violation regarding the monitoring activity may contribute to this emotional toxicity. For example, if the agent believes that monitoring is a willing act sponsored by the principal, rather than one mandated by outside forces (e.g., legislative mandate), the agent is more likely to feel that the contract is being violated. In a sense, the monitoring may violate an agreed-upon commitment to treat individuals in the organization with mutual respect and as adults, rather than as children. The monitoring may be perceived as a violation of that commitment, where the employees are treated as children and management assumes the role of parent. When a contract violation occurs in this type of relationship, emotional responses are likely to be intense.

POTENTIAL CONTRIBUTING FACTORS: PEER AND ORGANIZATIONAL EFFECTS

While the monitoring itself may induce both attitudinal and behavioral reactions, it is important to also highlight potential moderating factors that influence the way users interpret their experience with the monitoring and PWU. The fairness perceptions, privacy expectations, psychological contract assessments, and emotional responses are greatly shaped by group- and organizational-level variables. The shared norms and values among the peers regarding the monitoring and PWU may influence the compliance or defiance behaviors of those under surveillance. In addition, at the organizational level, the type and design of the PWU monitoring, along with the workplace climate, play a role in determining how and why users make sense of their interaction with the monitoring system.

Group-Level Factors

Some forms of PWU, which is the target of this type of electronic monitoring, can be socially acceptable among peers in organizations. The degree to which PWU is a normative behavior within a subculture may determine the level of compliance with the policy and reactions to the monitoring. The socialization and organizational culture represent the shared meaning system in which members

ascribe to norms and values manifested in their interaction with the organizational community.

Studying the influence of social interaction on antisocial behavior, Robinson and O'Leary-Kelly (1998) hypothesized that individuals experience a "monkey-see-monkeydo" effect in which socialization and interaction in their group could lead to morphing the misbehavior of their coworkers. Grounding their assumptions and hypotheses in Social Information Processing Theory, they contend that group members receive social cues about expectations for acceptable behavior at the group level and learn from role models about how to behave. The normative misbehavior may be expected and legitimate at the group level, but could be defined as illegitimate behavior from the organization's perspective. The survey study of 187 employees from various occupations found support for their hypotheses that the expectations for misbehavior at the group level influences the extent to which individual group members engage in such behavior. The role of social interaction and cultural norms and values influence how individuals think and feel about their experiences in the organization.

Extending this to the PWU context, Blanchard and Henle (2006) found that employees engage in cyberloafing when others around them view it as acceptable, including supervisors. With respect to the monitoring itself, further research must examine the influence of group members on individual behavioral responses. Nevertheless, students and scholars alike may apply the hypotheses of Kidwell, Roland, and Bennett (1993) to help explore whether norms and values in a subculture are potent factors in determining employee reactions to PWU-based monitoring. They contend that norms and social cues expressed by fellow employees or members of a workgroup may have a considerable effect on individual responses. The norms act as a regulatory mechanism, and conformity is heavily dependent upon the degree to which individuals internalize these norms through interaction. Equity, reciprocity, fairness, and peer-compliance norms define the extent to which individuals exert effort. If the utility of exerting effort is decreased by perceived unfairness associated with the employment relationship (e.g., monitoring), Kidwell et al. hypothesize that the propensity to withhold effort is likely to increase. If, however, the relationship is considered fair and fellow employees are providing the desired effort, regardless of whether the individual experiences a cost associated with exerting effort, the model suggests that individuals will adjust effort accordingly because of motivations to comply with social norms.

Organizational-Level Factors

In addition to the peer-effects, certain organizational characteristics may also affect individual reactions to the monitoring system. Related to the fairness perceptions just discussed, along with the assessment of the implicit psychological contract between employee and employer, the design of the monitoring system will likely shape user attitudes regarding PWU monitoring. Any existing sanctions

associated with knowingly violating the policy enforced by the monitoring may also influence user reactions. Lastly, the ethical climate within the organization may send social cues to users about the role and purpose of the monitoring in upholding certain ethical standards for behavior.

Researchers have found that job satisfaction and monitoring attitudes reflect the way in which the surveillance program is designed and implemented. Specifically, the experimental study by Urbaczewski and Jessup (2002) suggests that when the monitoring resulted in feedback regarding performance-related activity (i.e., how well they performed on a specific task), their level of satisfaction increased. However, when the monitoring feedback simply reported when and where they engaged in cyberloafing, users were less satisfied with the monitoring. This speaks to the type of information being collected and redistributed to the users. It seems as if the monitoring designed only to control for PWU behavior contributes to user dissatisfaction, while incorporating a performance aspect of the monitoring may be more beneficial for the organization and those under surveillance.

At the same time, research by Mirchandani (2004) suggests that organizations must also communicate the potential consequences associated with violating the Internet usage policy, which would be made known to management by the monitoring system. This could be in the form of an information-security-awareness training program, which would clearly articulate organizational policy and sanctions for violating that policy. This study, based on interviews and a survey of both employees and managers, suggests that respondents found remedies such as taking the Internet away from abusing employees or reprimanding those users were effective in curbing PWU. However, a study of the telecommunications industry (Batt, Colvin, & Keefe, 2002) links electronic monitoring with higher levels of quit rates because of the distrusting and toxic consequences previously discussed. This and other studies suggest that further research must examine how the monitoring and associated sanctions influence attitudes, organizational citizenship behaviors, and job withdrawal over time.

The current ethical climate reflected in the organizational culture may also shape user perceptions about monitoring and PWU. A recent study by Peterson (2002) examined the role of ethical workplace climate as an antecedent to deviant workplace behavior. Ethical climate was defined as the shared meaning system surrounding what is ethically appropriate behavior and how ethical issues are dealt with in the organization. The survey of 194 business professionals in various occupations revealed that indeed the ethical climate is an important organization-level antecedent. For example, Peterson's findings suggest that in an ethical climate where employee well-being is a major concern for all involved, employees are less likely to engage in deviant behavior. Conversely, Peterson also found that there is a greater chance of production deviance (e.g., doing personal work at work) in a climate where employees are mostly concerned for themselves. In addition, the study's findings

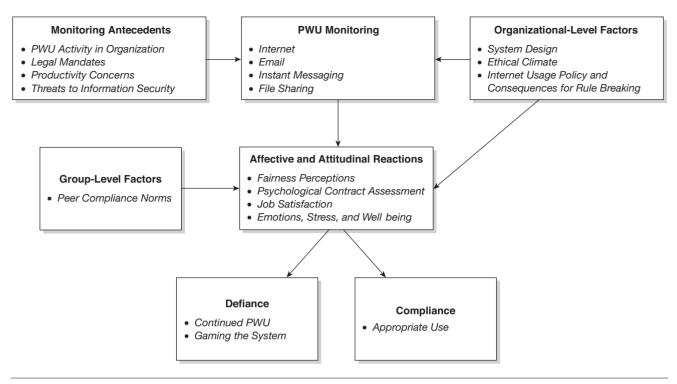


Figure 86.1 Monitoring PWU in the Workplace

indicate that when there is an ethical climate in which a minimal concern for adherence to organizational policies, such as those communicated by the PWU monitoring, deviance is more likely to occur.

TOWARD A CONCEPTUAL FRAMEWORK: MONITORING PWU IN THE WORKPLACE

The decision to employ electronic monitoring to observe PWU reflects the legal, financial, and information security concerns of management. While complementing training and policy, PWU-based monitoring is a tool for preventing and deterring this type of rule-breaking behavior. The monitoring may reflect the rational interests of the organization, but there are human consequences that require further investigation when considering user response. Figure 86.1 reflects an effort to conceptualize a framework for understanding the major antecedents and consequences inherent to PWU monitoring as a type of managerial control in the modern organization.

FUTURE DIRECTIONS

Given the extant research on electronic surveillance, and PWU monitoring in particular, many areas for further empirical inquiry exist. For example, students and scholars should consider the relationship among monitoring, PWU, and performance variables in an actual workplace context. Urbaczewski and Jessup (2002) took a first step in examin-

ing user satisfaction with PWU monitoring, task performance, and monitoring effectiveness, but the experimental setting with student subjects lacks contextual richness associated with an organization or multiple organizations with differing policies, employee demographics, tasks, and monitoring systems. With many organizations currently collecting PWU data, there is a breadth of opportunity for researchers to examine the human and performance consequences associated with PWU monitoring outside of the laboratory. Self-report data, such as from interviews and surveys, are quite useful for examining emotional and attitudinal reactions, such as with the study by Mirchandani (2004). Nevertheless, quantitative PWU and performance data collected by the organization over time will have great utility for determining the degree to which monitoring is an effective way of curbing this type of shirking.

Another relevant area for continued study of PWU monitoring is to empirically investigate the potential effects of altering the monitoring design and degree of user participation in the decision-making process. Existing research in electronic performance monitoring (e.g., Douthitt & Aiello, 2001) suggests that those who have more say in the way the monitoring is designed and the type of information collected are more willing to perceive the control tool as legitimate and fair. In the case of PWU, will users who participate in decision-making processes, such as determining which sites are to be blocked or the type of Internet activity monitored, develop positive attitudes toward the monitoring? Will this translate into greater compliance with the monitoring and policy? User participation may also extend to permitting override capabilities for work-related Internet

activities that may be blocked by the monitoring software. This may create a sense of partnership between the users and the information security staff responsible for monitoring. Again, the specifics of the monitoring design and level of participation may be manipulated in a field experiment or explored in case-study research to determine the effects on user-response behavior.

RECOMMENDATIONS

While many aspects of PWU monitoring require further research, there are a number of recommendations for organizations currently experiencing PWU and examining the possibility of employing monitoring systems. Individuals often conduct personal work at work to help balance the work and life demands placed upon them. In an effort to protect the network and ensure proper Internet usage, organizations may consider implementing policies that define and permit acceptable use during certain times of day so users can manage their personal and professional lives. Providing some degree of freedom may alleviate any psychological contract violation concerns associated with the monitoring. Permitting access to PWU that benefits the individual and organization, along with communicating to the users that the monitoring exists to protect them and the data, will likely contribute to ethical PWU and compliance with existing policy.

For example, training may be a forum for expressing the importance of security and mutual trust. It is important to note that employees who believe that management views them as distrusting are more likely to engage in misbehavior. Therefore, if employees are provided some discretion, involved in the monitoring process, and made aware of the policy and measures to ensure accountability for those abusing the system, the extent to which users comply and engage in Internet stewardship is likely to exist. A stringent and obtrusive electronic monitoring system may be counterproductive; organizations may be better served by implementing a more inclusive, self-regulatory approach to curbing inappropriate forms of PWU.

SUMMARY

The workforce of the 21st century is and will continue to be technologically sophisticated. However, that does not necessarily mean individuals operate like machines. Strict monitoring and policies assume that users are rational actors who abide by rules set by management. The prevalence of PWU, along with the corresponding structures to monitoring such behavior, is a managerial paradox. Decision makers must come to grips with the complexity associated with the factors involved in electronic monitoring in this context. While organizations observe PWU for numerous reasons, the effects on those being watched may create unintended consequences for management. The emotional and attitudi-

nal factors that underscore user compliance or defiance must be seriously considered as relevant variables in the decision to monitor personal Internet activity in the workplace.

REFERENCES AND FURTHER READINGS

- Alder, G. S., & Ambrose, M. L. (2005). An examination of the effect of computerized performance monitoring feedback on monitoring fairness, performance and satisfaction. *Organizational Behavior and Human Decision Processes*, 97(2), 161–177.
- Alge, B. J. (2001). Effects of computer surveillance on perceptions of privacy and procedural justice. *Journal of Applied Psychology*, 86(4), 797–804.
- American Management Association. (2005). 2005 Electronic monitoring & surveillance survey: Many companies monitoring, recording, videotaping—and firing—employees. Retrieved September 16, 2007, from http://www.amanet.org/press/amanews/ems05.htm
- Anandarajan, M., & Simmers, C. A. (2004). Constructive and destructive personal web usage in the workplace: Mapping employee attitudes. In M. Anandarajan & C. A. Simmers (Eds.), *Personal web usage in the workplace: A guide to effective human resources management* (pp. 1–27). London: Idea Group.
- Batt, R., Colvin, A. J. S., & Keefe, J. (2002). Employee voice, human resources practices, and quit rates: Evidence from the telecommunications industry. *Industrial and Labor Relations Review*, 55(4), 573–594.
- Blanchard, A., & Henle, C. (2006). *Identifying and predicting dif*ferent forms of cyberloafing: The role of norms and external locus of control. Paper presented at the 66th Annual Meeting of the Academy of Management, Atlanta, GA.
- D'Abate, C. P. (2005). Working hard or hardly working: A study of individuals engaging in personal business on the job. *Human Relations*, 58(8), 1009–1032.
- Devaney, E. E. (2006). Excessive indulgences: Personal use of the Internet at the Department of the Interior (Rep. No. Y-Ev-MOA-0002-2006). Washington, DC: United States Department of the Interior, Office of Inspector General.
- Douthitt, E. A., & Aiello, J. R. (2001). The role of participation and control in the effects of computer monitoring on fairness perceptions, task satisfaction and performance. *Journal of Applied Psychology*, 86(5), 867–874.
- Frey, B. S. (1993). Does monitoring increase work effort? The rivalry with trust and loyalty. *Economic Inquiry*, 31(4), 663–670
- Frost, P. J. (2003). *Toxic emotions at work: How compassionate managers handle pain and conflict.* Boston: Harvard Business School Press.
- Holman, D. (2002). Employee wellbeing in call centers. *Human Resource Management Journal*, 12(4), 35–50.
- Holman, D. (2003). Phoning in sick? An overview of employee stress in call centers. *Leadership & Organization Development Journal*, 24(3), 123–130.
- Holman, D., Chissick, C., & Totterdell, P. (2002). The effects of performance monitoring on emotional labor and wellbeing in call centers. *Motivation and Emotion*, 26(1), 57–81.
- Kidwell, J., Roland E., & Bennett, N. (1993). Employee propensity to withhold effort: A conceptual model to intersect three

- avenues of research. Academy of Management Review, 18(3), 429–456.
- Kolb, K. J., & Aiello, J. R. (1996). The effects of electronic performance monitoring on stress: Locus of control as a moderator variable. *Computers in Human Behavior*, 12(3), 407–423.
- Lane, F. S., III. (2003). The naked employee: How technology is compromising workplace privacy. New York: Amacom.
- Lee, Z., Lee, Y., & Kim, Y. (2004). Personal web usage in organizations. In M. Anandarajan & C. A. Simmers (Eds.), *Personal web usage in the workplace: A guide to effective human resources management* (pp. 28–45). London: Idea Group.
- Lim, V. K. (2002). The IT way of loafing on the job: Cyberloafing, neutralizing, and organizational justice. *Journal of Organizational Behavior*, 23(5), 675–694.
- Litzky, B., Eddleston, K. A., & Kidder, D. L. (2006). The good, the bad and the misguided: How managers inadvertently encourage deviant behaviors. *The Academy of Management Perspectives*, 20(1), 91–103.
- Mahatanankoon, P., Anandarajan, M., & Igbaria, M. (2004). Development of a measure of personal web usage in the workplace. *CyberPsychology & Behavior*, 7(1), 93–107.
- Malachowski, D., & Simonini, J. (n.d.). Wasted time at work still costing companies billions in 2006. Retrieved September 16, 2007, from http://www.salary.com/sitesearch/layoutscripts/sisl_display.asp?filename=&path=/destinationsearch/personal/par542_body.html
- McNall, L. A., & Roch, S. G. (2007). Effects of electronic monitoring types on perceptions of procedural justice, interpersonal justice and privacy. *Journal of Applied Social Psychology*, *37*(3), 658–682.
- Milbourn, G. C. (2003). *Inappropriate personal use of the Internet jeopardizes the security and privacy of taxpayer data* (Ref. No. 2003-2020-2133). Washington, DC: United States Department of Treasury.
- Mirchandani, D. A. (2004). A deterrence theory perspective on personal web usage. In M. Anandarajan & C. A. Simmers (Eds.), *Personal web usage in the workplace: A guide to effective human resources management* (pp. 111–123). London: Idea Group.
- Nagin, D., Rebitzer, J. B., Sanders, S., & Taylor, L. J. (2002). Monitoring, motivation and management: Determinants of opportunistic behavior in a field experiment. *The American Economic Review*, 92(4), 850–873.
- Nord, D., McCubbins, T. F., & Nord, J. H. (2006). E-monitoring in the workplace: Privacy, legislation, and surveillance

- software. Communications of the Association for Computer Machinery, 29(8), 73–77.
- Peterson, D. K. (2002). Deviant workplace behavior and the organization's ethical climate. *Journal of Business and Psychology*, 17(1), 47–61.
- Richardson, R. (2007). CSI Survey 2007: The 12th Annual Computer Crime and Security Survey. Retrieved September 16, 2007, from http://www.gocsi.com/forms/csi_survey.jhtml
- Robinson, S. L., & O'Leary-Kelly, A. M. (1998). Monkey see, monkey do: The influence of work groups on the antisocial behavior of employees. *The Academy of Management Journal*, *41*(6), 658–672.
- Spitzmüller, C., & Stanton, J. M. (2006). Examining employee compliance with organizational surveillance and monitoring. *Journal of Occupational and Organizational Psychology*, 79(2), 245–272.
- Stanton, J. M. (2000). Reactions to employee performance monitoring: Framework, review, and research directions. *Human Performance*, *13*(1), 85–113.
- Stanton, J. M., & Julian, A. L. (2002). The impact of electronic monitoring on quality and quantity of performance. *Computers in Human Behavior*, 18(1), 85–101.
- Stratton, M. T. (2005). An affective events theory-based conceptual model of emotional ambivalence in the context of personal web-usage monitoring. In N. Ashkanasy, W. Zerbe, & C. Härtel (Eds.), *The effect of affect in organizational settings: Research on emotion in organizations* (Vol. 1, pp. 47–76). New York: Elsevier.
- Urbaczewski, A., & Jessup, L. M. (2002). Does electronic monitoring of employee Internet usage work? *Communications of the Association for Computer Machinery*, 45(1), 80–83.
- Williamson, O. E. (1985). *The economic institutions of capitalism:* firms, markets, relational contracting. New York: Free Press, Collier Macmillan.

CROSS-REFERENCES

- Cultural Differences in Perceptions of Fairness in Organizational Contexts (22)
- Understanding and Managing Misbehavior in Organizations (72) Organizational Paranoia: Origins and Dysfunctional Consequences of Exaggerated Distrust and Suspicion in the Workplace (73) Emotion in Organizations (76)

Information Privacy in Organizations (87)

Information Privacy in Organizations

Bradley J. Alge and S. Duane Hansen *Purdue University*

ith descriptives like "the information age," "the information super highway," and "the knowledge economy"-popular in the mainstream business literature at the start of the 21st century—there can be little doubt that information plays a vital role in the success of any organization. Employees often are required to sign nondisclosure agreements upon entry into an organization wherein they vow that they will not divulge proprietary company information to outsiders. Such safeguards seem reasonable and are becoming necessary for organizations interested in protecting their assets—specifically, their intellectual assets-from getting into the hands of competitors or other entities that could misuse that information. Information is a broad concept, however, and the need for organizations to acquire and subsequently protect information is not limited to patents, "know how," organizational routines and technologies, and other intellectual property. Organizations also have a need to acquire and protect information about human assets, that is, their employees—the very people who will be entrusted to help the organization succeed. The gathering of employee personal information is dramatically on the rise and the mechanisms through which information is gathered are diverse and controversial.

Organizations have to be careful about how they gather and protect information, because as they attempt to gather personal information through various means, there is the potential to impinge on employees' sense of information privacy. *Information privacy* is defined as an employee's belief in his or her ability to control information about him- or herself and his or her resulting ability to act autonomously—free from the control of others (Stone & Stone, 1990). Information privacy, therefore, reflects an important psychological state influenced jointly by an organization's need to collect personal information on one hand and an individual employee's desire to maintain control over his or her personal information on the other hand. This constant tension between the organization and the individual over personal information also suggests that information privacy is part of dialectic process or struggle.

In his 1975 book, *The Environment and Social Behavior*, Altman argued that privacy represents a boundary-regulation process wherein individuals regulate their interpersonal boundaries with each individual varying in both *desire* for openness and closed-ness and *ability* to reach desired levels of openness and closed-ness. These needs parallel similar needs in the general psychology literature, including the need for affiliation or belonging and the need for distinctiveness.

There are times in one's work life, for example, where one wishes to close oneself off from others or to be separate or distinct (e.g., shutting the door to one's office; not answering phone calls). To the extent that people can achieve their desired level of closed-ness, privacy is maintained. Similarly, there may be times where the same employee desires social interaction with coworkers—or to be open to others (thus satisfying broader needs for affiliation and

belonging). He or she might invite such interaction, for example, by leaving the door open or working in a common area, and to the extent other employees stop by, privacy control is maintained. In this situation, privacy is not threatened because the interaction with others was desired and achieved. If, however, no coworkers stop by to visit when such visits are desired, a privacy void occurs insofar as individuals are experiencing unwanted seclusion. Both psychological goals—desire for openness and desire for closed-ness—exist along a continuum, and people struggle to achieve an optimum level. Moreover, one's optimum level may not remain static (i.e., the perceived boundary between the self and others and the desire for openness and closed-ness are fluid).

Employees are conscious of their own privacy boundaries and the actions of organizations aimed at gathering their personal information. When such organizational aims are irrespective of those boundaries, significant tension can result. That is, the need for an organization to collect employees' personal information to improve organizational security is frequently in conflict with employees' desires to maintain control over their personal information. Because of this tension and the growing number of ways—technologically and otherwise—organizations are able to monitor employees and collect information about them, the battle for personal information is becoming an increasingly important managerial dilemma that can no longer be easily discounted.

Given this dilemma, a question arises: How much information gathering should managers engage in if increased information gathering may undermine information privacy? To answer this question and understand this dilemma between employee and organization, a clear understanding both of the *need* for information gathering and the potential damaging effects of invading employee privacy is required. Assisting with this understanding is the primary goal of this chapter. In this chapter, significant trends related to information privacy and the concerns of both organizations and employees are discussed. Then, to illustrate the underlying dynamics that create information privacy concerns, a wellpublicized case involving a Fortune 500 company, Hewlett-Packard, is introduced. Next, a model of information privacy in the workplace that underscores this managerial dilemma is developed using references to the Hewlett-Packard case. Finally, implications for managers are discussed.

WHAT ORGANIZATIONS ARE DOING: INFORMATION GATHERING AND PRIVACY TRENDS

Employers must protect their assets, but how far should they intrude into the privacy of their employees in order to accomplish this goal? Employees have rights of privacy, or as Warren and Brandeis (1890) articulate, the right to be *let alone*, that must be respected, but research also indicates that intrusive electronic and other forms of monitor-

ing might have unintended psychological consequences on employees that can hurt both employees and employers in the long run. In this section, some of the specific trends and emerging technologies that potentially pose privacy threats to employees are discussed.

Electronic Performance Monitoring

Electronic performance monitoring, or EPM, refers to the gathering and processing of information about employees to measure employee performance (Aiello, 1995; Alder, 2001). EPM is commonly used in office settings because the nature of office work increasingly involves the use of computers; EPM can be used to track employee behaviors including keystrokes, Web sites visited, and e-mails created and sent. However, EPM is not limited to computers—it can take place by way of other electronic devices, such as telephones, video monitors, and global positioning systems (GPS). Consider the results from a 2005 American Management Association survey on electronic monitoring:

Web and Internet Monitoring

- 65% of employers block certain Web sites—a 27% increase from 2001
- 76% of employers monitor employee Web surfing
- 26% of employers have fired employees for inappropriate use of the Web or e-mail
- 36% of employers track computer keystrokes
- 50% of employers regularly review total computer content—this is up from 36% in 2001
- 55% of employers retain employee e-mails and review them regularly—this is up from 8% in 2001

Telephone Monitoring

- 57% of employers now block certain lines on their employees' phones
- 51% of employers now keep track of how long their employees talk on the phone, and about half of these tape and review employee voicemail—this is up from about 12% in 2001
- 6% of employers have fired employees for phone misuse

Video Monitoring

- More than 50% of employers video monitor their employees (up from 33% in 2001)
- 10% of employers video monitor for performance purposes
- 6% videotape all their employees

Global Positioning Systems (GPS) Monitoring

- 8% of employers use GPS to track employee ID cards
- 8% of employers use GPS technology to track employerowned cars

A burgeoning market of effective and inexpensive technology has made EPM a feasible and readily available tool for most employers.

Personality and Workplace Testing

Workplace testing has become very common in the 21st century (nearly half of employers administer such tests equating to several million tests each year), and increasingly reliable tests are being developed by researchers to measure individual differences. Workplace tests are often used in the employee selection process to help identify reliable and trustworthy employees who "fit" the organization. Personality tests, for example, are commonly used by employers to help determine whether a potential employee has personality problems or serious emotional disturbances that may adversely affect job performance-related outcomes, and whether the person will fit within the company's culture. Similarly, integrity tests are often employed to identify potential employees who are likely to engage in theft or other antisocial behavior. Certain organizations, where the confidentiality of information is part of the core business process, have a special interest in hiring people they can trust (i.e., the Central Intelligence Agency [CIA], the National Security Agency [NSA], and financial service companies). These organizations make integrity testing an integral part of their employee-selection process.

Despite their usefulness to organizations, workplace tests are often criticized. Some argue that integrity tests ask questions that probe too far into people's lives (i.e., aspects that may not affect one's ability to do the job reliably). Others argue that the administration of such tests is based on the assumption (sometimes false) that corporations have the ability, above and beyond the applicants themselves, to decide which job is best for whom.

Biometrics

Biometric authentication refers to those technologies that are capable of analyzing human biological and other characteristics for identification purposes. Examples include fingerprinting, eye-scanning, and body measurements and the idea behind such measurements is that they, unlike other forms of personal information, are hard to copy or steal. To date, biometrics has not been utilized on a grand scale for workplace purposes, but because of increasingly effective and inexpensive technology, this is likely to eventually change (the market for biometrics grew from \$500 million in 2002 to \$4 billion in 2007, and continued growth at this rate is anticipated).

The use of biometrics presents privacy concerns because of (a) the fact that biometric information, by its nature, involves the personal characteristics of people who may not want to share in the first place—especially to a government or other agency that may abuse that information in the future, and (b) biometric information could be as potentially

susceptible to identity theft as other kinds of identification methods

Drug Testing

Drug testing is increasing in the work place because most current illicit drug users are employed and drug use by these employees can influence performance and even their safety and the safety of those around them. Because the National Institute on Drug Abuse reports that these employed drug abusers cost their employers twice as much in medical and worker compensation claims as their drug-free coworkers, employers are highly motivated to prevent their employees from using illicit drugs. Common purposes for testing include preemployment testing, random testing, reasonable suspicion testing, post accident or incident testing, and treatment follow-up testing. Types of drug tests commonly required by employers include urine, hair, sweat, and saliva drug screens.

Because drug tests can be intrusive and even embarrassing (urine tests are sometimes conducted while medical personnel observe), a chief concern is that drug tests are too invasive and intruding for the benefit they provide. (Some studies, including the 1994 National Academy of Sciences and the 2004 Independent Inquiry into Drug Testing, have not been able to link drug use other than alcohol with workplace health and safety risks.)

Genetic Testing

Although few employers currently use genetic testing, because of the rapid growth of this science, it's anticipated that this will change in the near future—especially because the benefits could arguably be to both employees and employers. Genetic testing is the analysis of genes, chromosomes, and proteins in order to predict risk of disease, identify disease carriers, diagnose disease, or determine the likely course of a disease. Genetic testing can be used, for example, to detect genetic abnormalities resulting from workplace exposure to toxins or to detect susceptibility to workplace toxins. Currently, about 900 types of tests can detect about 50 different disorders that impact peoples' susceptibility to certain workplace toxins.

Genetic testing has obvious potential to aid both employers and employees, but the privacy question arises once again—exactly how much information should an employer have about a particular employee? Should employees have to merely hope that their employers will not opportunistically or negligently abuse their personal information?

"Open Officing," "Hot Desking," and "Hotelling"

New technology now allows many employees to work from home or on the go, and as a result, employers have increasingly sought to minimize their expenses for office space while flexibly providing office space for their employees when needed. Different methods of accomplishing this have evolved, most with the intent of supporting a system of unassigned/open, alternating, and/or shared seating arrangements. Intel Corp. and Dell Inc. are examples of large and growing corporations that take advantage of the benefits of "open office." (At these companies, executives and secretaries often work in identical cubicles next to one another, and oftentimes these employees will share their workspace and/or job with one another in an arrangement referred to as a "two in a box.")

This openness generally facilitates communication, teamwork, project focus, and employee attitudes, but in addition to these benefits, the sharing of a workspace does have some shortfalls. When executives, teams, or individual employees need to deal with confidential issues, it is difficult if there is no office or room in which they can meet privately. Once again, privacy is an issue.

Wi-Fi and Public Access Computing

Wi-Fi and Public Access Computing refer to the technology that has allowed people to access the Internet in shared locations. Anyone with a Wi-Fi-enabled device such as a computer or a handheld cell phone can connect to the Internet when he or she is near an access point, which covers a certain geographical area ranging from a few square feet to several city blocks. Wi-Fi technology is now often used by people and companies for Internet and phone access, though the technology is expanding to include many kinds of electronic devices.

The benefits of convenience provided by Wi-Fi are obvious, but there are also some potential privacy risks. Specifically, operators of "access points" are often able to access, if they so desire, the computers of those using their access points. This can also work the other way as well—people can hijack access points to gain services that they have not paid for, and they can even damage the access points or computers connected to them. As a result, privacy is at risk.

Summary

Each of the trends just discussed need not necessarily be viewed as undesirable per se, but each trend represents risks—especially the very real risk of compromising information privacy of those affected. Given this risk, one might wonder, are the practices discussed something that only desperate companies do? What about the leading companies? What about a company like Hewlett-Packard?

THE CASE OF HEWLETT-PACKARD: A TURBULENT RECENT HISTORY

Hewlett-Packard (H-P) was founded in 1939 by William R. Hewlett and David Packard. With 2006 revenues at nearly

\$92 billion, H-P is regarded as one of the world leaders in the highly competitive and turbulent information technology (IT) industry. With a large footprint in areas such as printers, personal computers, enterprise servers, and cameras, H-P is one of the historical "darlings" of Silicon Valley and is firmly entrenched in the Fortune 100.

In 1999, H-P hired a Lucent Technologies' executive, Carly Fiorina, as its chief executive officer. Interestingly, it was also in 1999 when the U.S. Congress enacted legislation making it a crime to use *pretexting* (i.e., falsely impersonating someone in order to gain access to information or records about him or her) to obtain financial information—a practice that would later come back to haunt H-P. Notably, the pretexting legislation passed in 1999 did not address the use of pretexting for purposes other than obtaining financial records.

The hiring of an outsider, Fiorina, was a historic one and marked a major shift in H-P's family-rooted, "promote-from-within" philosophy. Such a change does not always sit well with organizational "old-timers," and indeed, the hiring of Fiorina created a political climate at H-P that polarized the organization and fueled mistrust. This mistrust was fueled further in 2002 when, under Fiorina's championing, H-P acquired rival Compaq Computer Corp. in a \$19-billion deal. The merger was vehemently opposed by Walter Hewlett, son of cofounder William Hewlett, who waged a controversial proxy fight over the proposed merger, a fight Fiorina eventually won with the support of H-P's board of directors.

However, support from the board of directors would eventually wear out. Fiorina tendered her resignation to H-P on February 8, 2005, under pressure from the board over disagreements in strategy execution. On March 25, 2005, board member Patricia Dunn announced that Mark Hurd had been hired as chief executive officer, with Dunn serving as chair of the board. Neither Dunn nor Hurd knew at the time that this was just the beginning of a climate at H-P that had turned sour—a climate that was characterized by mistrust, breaches of confidentiality, secretive surveillance and monitoring, questionable tactics, further resignations, and legal actions.

MANAGERIAL FRAMEWORK

The Hewlett-Packard case study provides a real-world lens through which privacy issues in the workplace can be studied and understood. To that end, a framework will be offered and discussed with the goal of helping managers as they begin to assess the effects of their policies and actions on employee perceptions of information privacy (see Figure 87.1). First, a description of the framework—a general explanatory model for understanding information privacy in the workplace—will be given. Then the framework will be tested by applying it specifically to the Hewlett-Packard case.

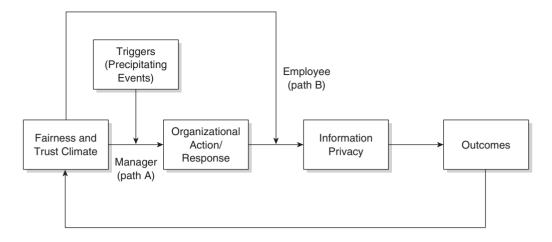


Figure 87.1 A Model of Information Privacy in Organizations

Factors Affecting Information Privacy

The key question is—at what point does a company cross the line? That is, when do the actions of an organization, for example, monitoring employees to gather personal information, lead to *invasions of privacy* (e.g., when people's actual levels of interaction are higher than their desired levels of interaction) where invasion implies some suboptimal level of information control? Figure 87.1 addresses this question. As can be seen, climate plays a critical dual role in triggering information privacy concerns.

Climate

Climate refers to employees' perceptions of formal and informal organizational policies and procedures (Ostroff, Kinicki, & Tamkins, 2003), and the climate literature distinguishes between individual perceptions (i.e., psychological climate) and group or aggregate perceptions (i.e., organizational climate). Climate reflects the current "pulse" of the organization—how it feels overall at a particular time. When there is shared agreement among organizational members, a strong organizational climate exists. Management scholars have studied different types of climate including safety climate, justice climate, and climate for change.

The first author of this chapter (along with his colleagues Jerald Greenberg and Chad Brinsfield), has elsewhere argued that justice climate plays a particularly powerful role in shaping people's reactions to organizational attempts to gather information (Alge, Greenberg, & Brinsfield, 2006). On the one hand, it acts as a driver—determining the types of organizational information-gathering practices that are deemed necessary—that is, climate can affect organizational decision makers' perceived need for personal information, prompting them to enact monitoring and related practices (path A in Figure 87.1). On the other hand, climate provides information to employees as they try to assess the impact of their organizations' efforts to gather their personal information (path B in Figure 87.1).

Early research on justice climate focused on *procedural* justice climate—the climate associated with the fairness of procedures an organization uses in reaching its decisions about employees. However, justice climate can also encompass *interpersonal* justice—the extent organizations treat its employees with dignity and respect, and *informational* justice—the extent organizations provide information and explanations for decisions. For our purposes, justice climate refers to the total justice climate including procedural, interpersonal, and informational components.

Triggers

In addition to organizational climate, critical events in the immediate time period may further fuel organizational decisions—that is, fuel the perceived need to collect more information—prompting the organization to increase the intensity and breadth of its information-gathering practices. For example, organizations may feel vulnerable to sexual harassment lawsuits (prompted by an employee complaining about a coworker sending inappropriate e-mail messages), and consequently, this vulnerability drives or increases the perceived need to more diligently gather personal information to control the actions of employees.

Organizational Action/Response

Organizational actions and responses refer to the information-gathering practices that organizations enact, including electronic monitoring and personality testing. When organizations have strongly positive justice climates, managers will be less likely to initiate and sustain information-gathering efforts. Under such circumstances, the perceived need for information is lower, and managers are consequently willing to live without the additional personal information. That is, there is trust.

When trust exists, there is less need for external control mechanisms such as monitoring. Trust, therefore, is an alternative or substitute for formal controls. When trust is high, organizations are willing to take on greater risk—that is, they are willing to be vulnerable to the possibility that employees will behave opportunistically. In essence, when trust is high, organizations are more likely to "bet" that their members will behave in a manner consistent with organizational goals.

When trust is low, however, managers have little confidence that employees will behave in the organization's interests. Such is typically the case when the justice climate is poor. Research has shown a consistently strong conceptual and empirical relationship between fairness in organizations and organizational trust (De Cremer, van Dijke, & Bos, 2006; Mayer, Davis, & Schoorman, 1995). Lacking trust, therefore, managers are more likely to implement external controls. They might, for example, gather information on employee performance via electronic monitoring by tracking employee movements (with GPS or video cameras), monitoring Web usage, or reviewing e-mail. They might turn to nonelectronic measures such as hiring private investigators to document the behaviors of employees or incorporate indirect measures of behavior such as personality tests. The very nature of these actions threatens information privacy because these actions require the collection of personal information, which may be at odds with an employee's willingness to give that information. Trust matters in information exchanges where privacy is a concern and fairness climate helps inform trust. When fairness and trust climate is poor, organizations will increase personalinformation collection efforts to substitute control for lack of trust

Information Privacy

Increased organizational actions to gather personal information pose a threat to employees' perceptions of information privacy—employees will feel less in control of their personal information, thereby experiencing an invasion of privacy. These effects are likely to be particularly severe when the actions take place in a climate that employees deem to be unfair and untrustworthy. At the same time, information-gathering efforts by organizations that are conducted within a fair climate may have little or no negative impact on information privacy concerns. For example, research indicates that when fairness principles are adhered to—for example, by providing advance notice with a detailed, sincere explanation for the organization's intention to monitor—employee reactions will be less severe.

At this point, a practical question arises—why should organizations care? Is there a compelling business case for minimizing information privacy violations? In other words, can minimizing privacy violations help performance-related outcomes? The next section helps us answer this question.

Outcomes of Information Privacy

The ability to achieve an optimal level of information privacy is essential to one's psychological well-being. In his seminal 1967 book, *Privacy and Freedom*, Alan Westin describes four key psychological functions that privacy serves: autonomy, emotional release, self-evaluation, and limited and protected communication.

On autonomy Westin notes, "the individual's sense that it is he who decides when to 'go public' is a crucial aspect of his feeling of autonomy" (p. 34). Emotional release, having opportunities to express oneself without the critical evaluative eye of an audience, is an important component in Newell's (1994) privacy conceptualization wherein privacy is critical to human-system maintenance and well-being. The notions of cognitive relief, catharsis, and rejuvenation (Pedersen, 1997), similarly reflect Westin's view of emotional release. Self-evaluation refers to the opportunity for individuals to reflect and process information. Finally, Westin's (1967) function of limited and protected communication ensures opportunities to share information with trusted others, and establishes boundaries regarding what can be revealed to others. Although each of these functions of privacy may in and of themselves drive particular employee behaviors, collectively they suggest that when employees' privacy is maintained, their intrinsic motivation ought to be salient. To illustrate the psychological and behavioral manifestations of this increased intrinsic salience, the primary focus will be on autonomy.

The autonomy function of privacy is important to a number of important employee outcomes. First, autonomy contributes to an overall sense of psychological empowerment (Spreitzer, 1995). Second, in part because of increased empowerment, autonomy enhances creativity (Amabile, 1983, 1988). Indeed, recent research has found employees' information privacy perceptions are positively associated with increased feelings of psychological empowerment and with increases in organizational citizenship behavior and creativity (Alge, Ballinger, Tangirala, & Oakley, 2006; Amabile, 1983, 1988; Zhou, 2003). Thus, maintaining information privacy tends to enhance employees' intrinsic motivation—increasing their sense of psychological empowerment and consequently, their creative performance on the job and their willingness to go above and beyond the call of duty-behaviors that tend to increase individual contributions to the overall competitiveness and performance of the organization.

On the other hand, when information privacy is impinged and employee intrinsic motivation is undermined, a reactance response is triggered that causes individuals to seek to reestablish control. Unfortunately for the organization, this may take the form of increased employee deviance behaviors such as leaking company information, theft, and sabotage, which are behaviors that tend to decrease performance outcomes.

So, in answer to the previously raised question—why should organizations care about information privacy—organizations *should indeed* care, because information privacy issues are likely to impact important psychological and behavioral outcomes of employees, which can in turn impact performance-related outcomes.

Information Privacy and Hewlett-Packard

This section will focus on the application of the foregoing principles and model to the Hewlett-Packard case (see Table 87.1 for timeline of events at H-P).

Organizational Actions and Fallout

On October 4, 2006, California Attorney General Bill Lockyer filed criminal charges against H-P chairwoman of the board, Dunn, H-P attorney, Kevin Hunsaker, and three outside investigators. Dunn, who resigned from her position as H-P's chairwoman in September of 2006, orchestrated surveillance against H-P board members—surveillance that used a controversial practice known as *pretexting* wherein investigators posed as H-P board members and as journalists to obtain their confidential personal phone records.

Thus, the critical organizational action in the H-P case that could affect employee-information privacy perceptions was the collection of personal information using nefarious means—specifically pretexting.

Allegedly, these surveillance activities violated several sections in the California Penal Code and consequently led the filing of four felony charges: (a) conspiracy to commit a crime; (b) fraudulent use of wire, radio, or television transmissions; (c) taking, copying, and using computer data in violation of Section 502(c)(2); and (d) using personal identifying information without authorization. Although federal law gives employers much leeway in how it chooses to monitor its employees, each state can impose additional privacy or monitoring stipulations. California is one of the strictest states in this regard and, unlike many states, explicitly recognizes a right to privacy in its state constitution.

Table 87.1 Timeline of Events at Hewlett-Packard

- 1999: U.S. Congress makes it a crime to obtain *financial* information through pretexting (but doesn't address the use of pretexting to obtain other data, such as phone records). (ftc.gov)
- January 24, 2005: The Wall Street Journal publishes a story indicating that the HP board is dissatisfied with Chief Executive Carly Fiorina. (CBSNews)
- 3. February 9, 2005: Then board member, Patricia Dunn (the rags-to-riches daughter of a Las Vegas showgirl) announces that Carly Fiorina's controversial tenure as HP's CEO will end (after some discussion about board member information leaks to the press). Patricia Dunn oversees the hunt for Fiorina's successor. (CBSNews)
- March 29, 2005: Patricia Dunn announces that Mark Hurd has been hired as the new CEO; Patricia Dunn retains the chairwoman title. (CBSNews)
- January 23, 2006: News.com publishes a story quoting an anonymous HP source who described a confidential gathering of HP directors. The leak apparently angered Dunn. (CBSNews)
- 6. January, 2006: As part of the KONA II investigation (costing HP over 300,000 dollars), a firm in Florida (a firm with past clients such as Ford Motor Co., DaimlerChrysler AG, J.P. Morgan Chase & Co., Citigroup Inc., and Honda Motor Co. among others) acts on behalf of HP (Patricia Dunn, Chairman of the Board) by method of "pretexting" in order to obtain January '06 cell phone, home phone, and fax record information of HP board members or directors and nine journalists, including reporters for CNET, the New York Times, and the Wall Street Journal. (CBSNews)
- January 29–February 2, 2006: Someone creates an online account in the name of HP board member and noted Silicon Valley venture capitalist Thomas Perkins

- and orders his home phone records from AT&T Inc. (CBSNews)
- 8. March 2006: Kevin Hunsaker, HP's chief ethics officer, briefs HP leaders on his investigations findings about the boardroom leak—his report is based on findings obtained through illegal means. (CBSNews)
- 9. May 18, 2006: Patricia Dunn announces to the HP Board that she has identified (by illegal means) the board member (George Keyworth) who had been leaking information to the press. Perkins, a board member, angry, resigns, and storms out of the meeting. (CBSNews)
- **10.** May **22, 2006**: HP files a document with the SEC to notify investors that Perkins has resigned. (CBSNews)
- **11. June-July 2006**: Perkins and his lawyer demand information from HP about how HP identified Keyworth as the information leaker. (CBSNews)
- 12. August 16, 2006: California's attorney general and the California Highway Patrol Computer Crimes Investigation Unit meet with AT&T executives to review "pretexting," or impersonating a person in order to access their personal information. (CBSNews)
- **13. August 31, 2006**: The State of California issues a search warrant for Cox Communications, Inc., where Perkins' phone records went. (CBSNews)
- **14. September 5, 2006**: *Newsweek* publishes their story revealing that the chairwoman of HP, Patricia Dunn, had hired a team of independent electronic security experts who spied on HP board members and several journalists. (techlawjournal.com)
- **15. September 6, 2006**: HP reports to the SEC that it used the method of pretexting. (news.com)
- **16. September 7, 2006**: California Attorney General announces that HP's pretexting broke state law. (news.com)

- **17. September 8, 2006**: Patricia Dunn calls the journalists whose personal information was obtained illegally to apologize. (news.com)
- September 11, 2006: A House committee makes a request for documents related to the leak investigation. (infoworld. com)
- **19. September 22, 2006**: HP announces that Patricia Dunn will resign from her position as HP's Chairman of the Board, and that Hurd will take her place while Richard Hackborn will become the lead independent director. (news.com)
- **20. September 25, 2006**: HP's global investigations unit manager, Gentilucci, resigns. (news.com)
- 21. September 28, 2006: Ann Baskins, head HP attorney, resigns as Senior VP and General Counsel, insisting that senior HP counsel assured her of the legality of HP actions. Hours later she invoked her 5th Amendment right to refuse to answer questions when she appeared before the House Committee on Energy and Commerce. (investor.hp.com/EdgarDetail.cfm)
- **22. October 4, 2006**: California Attorney General Bill Lockyer files criminal charges and arrest warrants against Patricia Dunn and Kevin Hunsaker (who led Dunn's investigation), and three outside investigators. The complaint alleges four felonies under the California Penal Code (CBSNews):
 - a. Conspiracy to commit crime in violation of Sections 182(a)(1)
 - b. Fraudulent use of wire, radio, or television transmissions in violation of Section 538.5
 - Taking, copying, and using computer data in violation of Section 502(c)(2)
 - d. Using personal identifying information without authorization in violation of Section 530.5(a)

- **23. October 8, 2006**: Reuters story is released claiming that HP is hardly the only company guilty of the methods employed by Patricia Dunn. (Reuters/http://www.feed24. com/go/30710246)
- 24. October 11, 2006: Patricia Dunn, asserts that "[she] did not run, supervise, or direct the [illegal] investigations." (news.com)
- **25. November 15, 2006**: Patricia Dunn pleads not guilty in California court to four felony charges. (nbc11.com)
- **26. December 7, 2006**: HP pays \$14.5 Million to settle civil charges brought against it by the California Attorney General. (California plans to spend most of the money investigating privacy rights and intellectual property violations.) (nbc11.com)
- 27. December 11, 2006: The U.S. Senate passes a bill inspired by the HP scandal, making "pretexting" or pretending to be someone else in order to obtain personal records subject to greater legal restrictions. (Infoworld.com)
- 28. January 10, 2007: Bryan Wagner, a private investigator hired by HP, already charged in California, is charged by the U.S. federal government with conspiracy and identity theft for allegedly obtaining the Social Security Number of a journalist. (NBC11.com)
- **29. January 18, 2007**: Mark Hurd, HP CEO, replaces Patricia Dunn as Chairman of the Board. (Washingtonpost.com)
- **30. January 2007:** Attorney General Lockyer offers plea reducing felony charges to misdemeanors; Dunn refuses to cop plea. (infoworld.com)
- **31.** March 2007: New California Attorney General, Jerry Brown, drops charges against Patricia Dunn and other defendants

Privacy will likely be salient in this situation for several reasons. First, the mere collection of personal information increases privacy tensions. Second, in evaluating information privacy, employees seek understanding and in particular look to the "legitimacy" of the information gathering and handling practices (Alge et al., 2006). The fact that H-P's actions were not only questionable ethically, but also may have broken federal and state laws, raises serious questions concerning legitimacy. The stakeholders affected (in this case, the board members who were spied on) were not informed of the potential of surveillance in advance. Moreover, deception was used to collect their personal phone records and to do so, private investigators fraudulently misrepresented themselves as board members to phone companies using board members' social security numbers. Finally, actions taken in this manner undermine any trust that may have existed. Consequently, board members and employees will lack confidence that their personal information will be respected and safeguarded. Hence, they will feel they have less control over their personal information.

So given this, why would H-P revert to pretexting methods to spy on its board of directors?

Climate and Precipitating Triggers

What factors led Dunn to spy on her own fellow board members at H-P? To begin, the climate at H-P had begun to sour during Fiorina's tenure. In particular, the Compaq merger appeared to be a particularly polarizing event, pitting Fiorina and her board against H-P old-timers. In the proxy fight, accusations and misinformation were spread, contributing to a general environment of mistrust. In addition, Fiorina was battling damaging proprietary, confidential information leaks to the press that only board members would know (Markoff, 2006). The polarization from the Compaq merger, the damaging leaks of information to outsiders, and a CEO, Fiorina, who was an "outsider" as well, all created an environment of mistrust that would contribute greatly to Chairwoman Dunn's later decision to use pretexting to spy on her board members.

After Fiorina was forced out at H-P, top-secret information was again leaked to various media outlets, including the technology news site CNET.com. These leaks would constitute *precipitating events*—events that are particularly salient and important to the decision to gather more personal information (see Figure 87.1). The leaks put H-P and Dunn in a vulnerable position—increasing their need to gather more personal information to root out any "squeaky wheels." Certainly, the goal of eliminating harmful leaks seemed worthwhile for Dunn. Thus, a poor justice and trust climate created a need to monitor and control, and this need was accelerated by the security breaches of unknown, suspected board members who may have leaked confidential information to the press.

Information Privacy

The fact that H-P was using pretexting to gather the personal phone records of its board members was insufficient to trigger information privacy concerns. That is, one must have knowledge that his or her personal information is vulnerable to outside control, that is, no longer under his or her sole personal control.

When Dunn received a report from the spying she had ordered, she called a meeting of the board. There she announced that board member George Keyworth was the source of the leaks. Keyworth was dismissed from the board, but another board member, Thomas Perkins, who objected to the methods used, also resigned from the board, and it was not until September of 2006 that the controversial use of pretexting was made public. H-P was required to report to the SEC of board changes. This, coupled with pressure from Perkins, led to the September 2006 disclosure from H-P of the pretexting effort. A firestorm of criticism and scrutiny ensued, and the very public nature of H-P's spy activity made salient the risk that organizational members faced.

Outcomes

Immediate outcomes in the H-P case were both voluntary (e.g., Perkins) and involuntary (Dunn, Keyworth) departures. However, what might be the other short-term and long-term outcomes from the H-P scandal? Do actions like these, coupled with the already poor climate suggest that information privacy will continue to be a concern at H-P? If so, perhaps employees of H-P will feel less in control and experience less intrinsic motivation to perform in the future. This may manifest itself in decreased creativity, employee silence or withholding of information, greater impression management, fewer helping behaviors, and an increase in some types of employee deviance, namely deviance that is difficult for monitoring and surveillance to detect. Though it may be difficult to validate whether any of these concerns come to fruition at H-P post surveillance, one thing is clear: H-P suffered a significant blow to its image and this could affect future public relations, image, customer and employee loyalty, and H-P's ability to attract talent.

MANAGERIAL IMPLICATION

This chapter illustrates the complex nature of information privacy in organizations. Twenty-first-century managers face many difficult choices when it comes to collecting and handling employee information. Managers must ask themselves the following questions:

- Should I collect personal information at all? Is there a compelling need?
- What specific information should be collected?
- · How much information should be collected?
- How often should information be collected?
- What are the means through which information will be collected? Are the procedures fair?
- For what purpose will the information be collected? That is, how will it be used? Is there proper justification? Is that justification clearly shared with employees before the collection occurs?
- What is the climate like? Is it conducive to collecting personal information?

Managers must be prepared to address these questions prior to any organizational actions targeted to acquire and use employee personal information. That is, managers must pay attention to the design of the systems (the technologies, people, and processes) responsible for the collection and use of employee personal information. Fairness should be a primary concern. Specifically,

- managers must be sure that the climate is sufficiently benign so that people's reactions to personal information gathering will be inconsequential. If the climate is not sufficiently benign, then managers ought to first consider improving the fairness climate before moving to actions to gather personal information. (In fact, improving the climate may mitigate the need to collect such information.)
- once the decision has been made to collect personal information, managers must make sure due process is adhered to—they should involve employees in the design of such systems, provide advanced notice of information gathering, ensure employees authorize any external use of collected data, and provide a detailed explanation for why such information is necessary for them to collect, thereby increasing employee understanding and acceptance. By making the process transparent to employees, employees will retain some measure of control over their personal information—alleviating the threat to information privacy.

CONCLUSIONS

Information privacy continues to be a concern as organizations increasingly collect and handle employee personal information. Presumably, the ultimate goal of these efforts is to ensure competitive viability and survival of the organization. At the same time, these efforts can have the paradoxical effect of actually making organizations less competitive, particularly if information privacy is not maintained. For example, and as discussed, information privacy is inextricably linked to intrinsic motivation, and employees whose privacy is threatened will be less motivated to share knowledge, take risks, and provide the types of creative input that will ensure an organization remains competitive.

With respect to H-P, the verdict is still out. In January 2007, then Attorney General Lockyer offered to reduce the felony charges to misdemeanors in a plea arrangement. Dunn and the others accused refused to cop a plea—presumably because they could have still been under jeopardy at the federal level. In March of 2007, however, the new attorney general Jerry Brown dropped all charges against Dunn and the others. Thus, even in a state like California, where workplace privacy is given more credence, it is often difficult to prosecute organizations for spying activities that threaten employee privacy, as the H-P case illustrates. It remains to be seen whether federal charges will be brought against the participants in the H-P pretexting case.

Though it is hard to perceive all possible and future ramifications, one thing is for sure with respect to the H-P scandal: the actions taken by Dunn have been felt both internally by H-P stakeholders and externally in the form of negative publicity. So, returning to one of the initial questions raised in this chapter—can organizations go too far with respect to gathering information on its employees? The H-P case suggests that answer is a resounding "yes."

Aside from the public-relations problems that the H-P case presents, what does it mean strategically for H-P? That is, how might innovation in the long-term be affected? The model presented in this chapter points to the constraining effect of information gathering on innovation and subsequent performance-related outcomes. Yet, companies like H-P supposedly have made their mark on innovation. Interestingly, in her recent book, *Tough Choices*, former H-P CEO Fiorina is a bit more critical of the innovative culture. She writes about H-P and its founders:

Bill and Dave had once been radicals and pioneers. Now, I'd seen too many instances where a new idea was quickly dismissed with the comment: "We don't do it that way. It's not the HP Way." The HP Way was being used as a shield against change.

Could Fiorina's insight foreshadow things to come? It's inarguably true that the leaks, the mistrust, and the secret surveillance may all work to create a climate that makes innovation difficult—innovation that H-P has supposedly built its reputation around. It will be interesting to see how things unfold.

REFERENCES AND FURTHER READINGS

Aiello, J. R. (1995). Electronic performance monitoring and social context: Impact on productivity and stress. *Journal of Applied Psychology*, 80(6), 738–745.

- Alder, G. S. (2001). Employee reactions to electronic performance monitoring: A consequence of organizational culture. *Journal of High Technology Management Research*, 12(2), 323–342.
- Alge, B. J. (2001). Effects of computer surveillance on perceptions of privacy and procedural justice. *Journal of Applied Psychology*, 86(4), 797–804.
- Alge, B. J., Ballinger, G. A., Tangirala, S., & Oakley, J. L. (2006). Information privacy in organizations: Empowering creative and extra-role performance. *Journal of Applied Psychology*, 91(1), 221–232.
- Alge, B. J., Greenberg, J., & Brinsfield, C. (2006). An identity-based model of organizational monitoring: Integrating information privacy and organizational justice. In J. Martocchio (Ed.), *Research in personnel and human resource management*, (Vol.25, 71–135). San Diego, CA: Elsevier.
- Altman, I. (1975). *The environment and social behavior: Privacy, personal space, territory, crowding.* Monterey, CA: Brooks/Cole Publishing.
- Amabile, T. M. (1983). The social psychology of creativity: A componential conceptualization. *Journal of Personality and Social Psychology*, 45(2), 357–377.
- Amabile, T. M. (1988). From individual creativity to organizational innovation. In K. Gronhaug & G. Kaufmann, G. (Eds.), *Innovation: A cross-disciplinary perspective* (pp. 139–166). New York: Oxford.
- Amabile, T. M. (1997). Motivating creativity in organizations: On doing what you love and loving what you do. *California Management Review*, 40(1), 39–58.
- American Management Association. (2005). *Electronic monitoring and surveillance survey*. New York: Author.
- American Management Association. (2007). American Management Association (AMA) management training and professional development seminars, workshops and books. Retrieved September 2, 2007, from http://www.amanet.org/
- Bernstein, J. (1999, April 22). Financial identity theft. *Federal Trade Commission*. Retrieved September 3, 2007 from http://www.ftc.gov/os/1999/04/identitythefttestimony.htm
- Carney, D. (2006, September 6). HP admits spying on its directors via pretexting to obtain confidential home phone records. *Tech Law Journal*. Retrieved September 3, 2007, from http://www.techlawjournal.com/topstories/2006/20060906.asp
- CBS News. (2006, October 4). *Paper jam at HP*. Retrieved September 3, 2007, from http://www.cbsnews.com/elements/2006/10/04/in depth business/timeline2063653.shtml
- Culnan, M. J., & Armstrong, P. K. (1999). Information privacy concerns, procedural fairness, and impersonal trust: An empirical investigation. *Organization Science*, 10(1), 104–115.
- De Cremer, D., van Dijke, M., & Bos, A. E. R. (2006). Leader's procedural justice affecting identification and trust. *Leadership & Organization Development Journal*, 27(7), 554–565.
- Electronic Privacy Information Center. (2007). Electronic Privacy Information Center home page. Retrieved September 3, 2007, from http://www.epic.org/
- Fiorina, C. (2006). Tough choices. New York: Penguin.
- Gross, G. (2006, December 11). Congress passes 'pretexting' phone records bill. *InfoWorld*. Retrieved September 2, 2007, from http://www.infoworld.com/article/06/12/11/HNcongresspretextingbill_1.html
- Kawamoto, D., & Krazit, T. (2006, September 5). Media leaks prompt HP board shake-up. *Cnet News*. Retrieved September 2, 2007, from http://news.com.com/2100-1014_3-6112501.html

- Markoff, J. (2006, October 5). Ex-chief of H.P. pursued leaks, too. *The New York Times*. Retrieved August 28, 2007, from http://www.nytimes.com/2006/10/05/technology/05leak.html?ex=1188446400&en=5080f1917aba2468&ei=5070
- Mayer, R. C., Davis, J. H., & Schoorman, F. D. (1995). An integrative model of organizational trust. *Academy of Management Review*, (20)3, 709–734.
- Mullins, R. (2007, January 18). California offers Dunn, former HP execs, plea deals. *InfoWorld*. Retrieved September 3, 2007, from http://www.infoworld.com/archives/emailPrint.jsp?R=printThis&A=/article/07/01/18/HNhpexecpleadealoffer 1.html
- National Workrights Institute. (2007). *National Workrights Institute home page*. Retrieved September 2, 2007, from http://www.workrights.org/
- Newell, P. B. (1994). A systems model of privacy. *Journal of Environmental Psychology*, 14(1), 65–78.
- Ostroff, C., Kinicki, A. J., & Tamkins, M. (2003). Organizational culture and climate. In W. C. Borman, D. R. Ilgen & R. J. Klimoski (Eds), *Handbook of psychology*, (Vol. 12, pp. 565–593). New York: Wiley.
- Pedersen, D. M. (1997). Psychological functions of privacy. *Journal of Environmental Psychology*, 17(2), 147–156.
- Privacy Rights Clearinghouse. (2007). *Privacy Rights Clearing-house*. Retrieved September 2, 2007, from http://www.privacyrights.org/
- Richtel, M. (2007, March 15). Charges dismissed in Hewlett-Packard spying case. *New York Times*. Retrieved September 2, 2007, from http://www.nytimes.com/2007/03/15/technology/15dunn.html?ex=1331611200&en=db679c65c6af7740&ei=5089&partner=rssyahoo&emc=rss

- Robertson, J. (2007, January 11). Investigator faces charges in HP probe. *Washington Post*. Retrieved September 2, 2007, from http://www.washingtonpost.com/wp-dyn/content/article/2007/01/11/AR2007011100075.html
- Shankland, S. (2006, September 8). HP chairman: Use of pretexting 'embarrassing'. *Cnet News*. Retrieved September 2, 2007, from http://news.com.com/HP+chairman+Use+of+pretexting+embarrassing/2100-1014_3-6113715.html
- Spreitzer, G. M. (1995). Psychological empowerment in the workplace: Dimensions, measurement, and validation. *Academy of Management Journal*, 38(5), 1442–1465.
- Stanton, J. M., & Stam, K. R. (2006). *The visible employee*. Medford, NJ: Information Today.
- Stone, E. F., & Stone, D. L. (1990). Privacy in organizations: Theoretical issues, research findings, and protection mechanisms. In G. Ferris & K. Rowland (Eds.), Research in personnel and human resource management (Vol. 8, pp. 349–411). Greenwich, CT: JAI Press.
- Warren, S., & Brandeis, L. D. (1890). The right to privacy. *Harvard Law Review*, 4, 193–200.
- Westin, A. F. (1967). Privacy and freedom. New York: Atheneum. Zhou, J. (2003). When the presence of creative coworkers is related to creativity: Role of supervisor close monitoring, developmental feedback, and creative personality. Journal of Applied Psychology, 88(3), 413–422.
- Zuboff, S. (1988). In the age of the smart machine: The future of work and power. New York: Basic Books.
- Zweig, D., & Webster, J. (2002). Where is the line between benign and invasive? An examination of psychological barriers to the acceptance of awareness monitoring systems. *Journal of Organizational Behavior*, 23(5), 605–633.

Multilingual Issues in Global E-Commerce Web Sites

Shaoyi He

California State University, San Marcos

n the information age represented by the Internet and the World Wide Web, the language representation online has evolved from the monolinguality of one English language into the multilinguality of more than 1,000 languages (Crystal, 2001). As a natural outcome, multilingual Web sites have become a common ground for online communication for peoples across national boundaries. On the Internet, Web users spend more time and come back more often to the Web sites that are in their native language and appeal to their cultural sensibilities. Visitors to a Web site would stay twice as long if the content on the Web site were available in their own language. Their willingness to buy something online increases by at least four times if the Web site is localized to meet their needs to thoroughly research the product and the company. (De-Palma, 2006; Enos, 2001; Schreiber Translations, 2007; WorldLingo, 2006). According to an Internet Executive ePanel done by International Data Corporation (IDC) in 2000, adding multilingual capability to a company's Web site significantly increases global e-commerce revenue up to three times (Parr & McManus, 2000). Additionally, the statistics provided by Internet World Stats, an international Web site specializing in Internet usage and population statistics from 233 countries and regions, show that between the years of 2000 and 2007, Internet usage has increased 248.8% in Asia, 638.4% in Africa, 491.4% in the Middle East, and 433.4% in Latin America and the Caribbean (2007a). With such a steady and rapidly growing non-English-speaking population on the Internet, multilingual Web sites have become an important phenomenon that involves issues of language, culture, and technology. This growing population continues to create new challenges for multilingual communication in global e-commerce. Therefore, we need to make sure that the Internet as a multilingual community will allow every individual, every culture, every language, and every technology to contribute to and benefit from such a multilingual online world. This chapter has provided an in-depth discussion on some interesting aspects of multilingual issues in global e-commerce Web sites, focusing on the main challenges and major solutions. Practical recommendations will be also discussed in detail. All of these would lead to a better understanding of multilingual issues in global e-commerce Web sites, so that (a) the obstacles created by language barriers could be removed, (b) the misunderstandings brought by cultural differences would be avoided, and (c) the problems caused by technological difficulties could be solved.

This chapter discusses multilingual issues in global e-commerce Web sites, focusing on the major challenges and main solutions. Future trends are also outlined for multilingual Web sites in global e-commerce.

INTERNET: FROM MONOLINGUAL TO MULTILINGUAL

At the end of 1998, among the Internet population, 58% were English speaking and 42% were non-English speaking. The dominance of English on the Internet came to an end in 2000 when the number of non-English-speaking

users surpassed the number of English-speaking users (Global Reach, 2004). According to Global Reach, a marketing communications consultancy that has been tracking non-English-speaking online populations since 1995, in December 2000, 49.1% of Internet users spoke English, while 50.9% of Internet users did not speak English (2004). Since then, the non-English-speaking population on the Internet has been steadily growing larger and larger. According to the Internet World Stats Web site, non-English-speaking Internet users reached 70.5% on March 10, 2007. Until this day, the ten most popular languages on the Internet were English (29.5%), Chinese (14.3%), Spanish (8%), Japanese (7.7%), German (5.3%), French (5.0%), Portuguese (3.6%), Korean (3.1%), Italian (2.8%), and Arabic (2.6%). Obviously, more than half (52.4%) of all Internet users are from a small number of non-English-speaking countries in East Asia and Europe, and many of them might be limited to their native language for accessing information on the Internet. This means that the Internet is no longer an English-dominated technology and is continuing to become much more popular with its multilinguality. The statistics also show that in 2005, 4 of the top 5 Internetusing nations were non-English speaking, namely China, Japan, Germany, and India (Internet World Stats, 2007b). Internet usage growth in traditional strongholds such as the United States and the United Kingdom has flatlined. Future growth is predicted to be strong in non-Englishspeaking countries such as China, Japan, Germany, India, South Korea, Italy, France, Brazil, and Russia (Computer Industry Almanac, Inc. 2004). Such a rapid increase in the number of non-English-speaking Internet users strongly implies that while the Internet is becoming more multilingual, it is more crucial and challenging for companies to create and maintain multilingual Web sites to gain a greater competitive edge in the Internet global marketplace (Appleby, 2003; Perrault & Gregory, 2000; Seilheimer, 2004; Starr, 2005).

A Web site is primarily a marketing tool, whether it is being used to promote a product or a service or just to spread the word about an organization or an organization's activities. Even if the main goal of your site is not to sell something, you have created it and posted it because you want people to spend time looking at it. If indeed you are ultimately trying to sell a product or service, your best chances at accomplishing that are by keeping people interested and coming back to your site for the information that is there. People will spend more time and come back more often to sites that are in their native language and appeal to their cultural sensibilities (Schreiber Translations, 2007). Numerous companies provide technologies and services for companies that are interested in having multilingual Web sites to meet the needs of their customers in global e-commerce. Also, numerous scholars research both theoretical and practical aspects of Web site multilinguality in global e-commerce. In addition, numerous publications offer advice and guidance for building and maintaining multilingual Web sites in global e-commerce (King, 2004; Levy, 2001;

Nantel & Glaser, 2004; Payne, 2005; Schneider, 2005; Singh & Boughton, 2005; WorldLingo, 2006; Würtz, 2005; Yunker, 2003).

GLOBAL E-COMMERCE AND MULTILINGUAL WEB SITES

E-commerce refers to commercial activities in a global marketplace that take place over a computer network, usually the Internet. Because of the international nature of the Internet, the companies that engage in e-commerce ultimately use their Web sites to conduct commercial and noncommercial activities in a global e-commerce environment. Global e-commerce is about providing business environments in a format that is useful to all customers, and it is about catering to different markets with different language backgrounds, measurement systems, cultural sensibilities, and preferences (Schneider, 2005; Westland & Clark, 2002). With Internet technologies, people who are doing global e-commerce are able to buy, sell, and market products. Global e-commerce makes the best use of any of the Internet applications, such as Web sites, e-mail, instant messaging, online auctions, online forums, Web services, blogs, and so forth (Reynolds, 2004; Schneider, 2005). Furthermore, for any company that is serious about winning the competitive edge in global e-commerce, the better way to success is to develop and maintain a multilingual Web site (Ghanem, 2001; Ott, 1999; Payne, 2005).

Along with the monolingual to multilingual evolution of the Internet, more and more non-English-language Web sites were developed to meet the rising needs of the non-English-speaking Internet users all over the world. For example, Yahoo! is one of the earlier companies that made successful efforts in launching the Yahoo! France and Yahoo! Japan Web directories specifically for Frenchspeaking and Japanese-speaking Internet users (Jenkins, 1997). Since then, major companies have been moving steadily to multilingualize their Web sites. According to a study done by the bigword, a translation service company, 58% of Fortune 500 companies in the United States currently have multilingual Web sites (2006). For example, Coca-Cola, the number one global brand that sells products in more than 100 countries and regions, has more than 100 Web sites in more than 30 languages. Nike does business in more than 140 countries and makes more money outside the United States than it does within the country. One of the two priorities set forth by CEO Philip Knight in Nike's 2001 annual report was to become a truly global company. Its Web site offers information in 13 languages, including the 10 most popular languages on the Internet that are used by more than 80% of Internet users (Internet World Stats, 2007b). The study done by the bigword also found out there is a slight correlation between the size of the company and the multilinguality of its Web site. Although many Fortune 500 companies, large or small, have multilingual Web sites, 70% of the largest 20 companies have some degree of localized content in different languages. For the 20 smallest Fortune 500 companies, the proportion of their Web sites with multilingual content falls to 50% (thebigword, 2006).

There are numerous ways for a company to have multilingual components on its Web site (Dempsey & Sussman, 1999; King, 2004; Payne, 2005; Stoyanova, 2005). The first way is "one language, one Web site," which means that a company has a separate Web site for each language. This usually ends up in a separate domain as well. For example, McDonald's, with over 20,000 restaurants in over 100 countries, has its primary Web site in English and language-specific Web sites for 61 countries. The URL of its Web site in Simplified Chinese for Mainland China is www.mcdonalds.com.cn/, and the URL of its Web site in Traditional Chinese for Taiwan is www.mcdonalds.com. tw/. Each has a different domain name. Another way is to have Web pages in different languages embedded in the subdomains of the primary Web site. For instance, IBM's primary Web site URL is www.ibm.com, and its Web site in Simplified Chinese for Mainland China is www.ibm.com/ cn/, while its Web site in Traditional Chinese for Taiwan is www.ibm.com/tw/. They both share the same domain with the primary Web site in English. The other way is to have different languages accessible on the same Web page on the same Web site. An examples is the search engine giant Google. When using a non-English query to search for English Web pages, the search results would be in both languages on the same Web page. Another example can be found on Web sites that provide Web-based translation services because it is inevitable to include multilingual content on the same Web page.

For a company targeting customers in global ecommerce, developing a multilingual Web site should reach beyond just translating the original Web content into different languages for different locales. With a well-designed and well-implemented multilingual Web site for a given audience, a company could adequately meet their information needs. For instance, a Chinese version of a corporate Web site should promote information relevant to a Chinese audience. Overcoming potential cultural barriers is possible when users are able to navigate, understand, and interact on the Web site in their native language. In addition, a properly designed multilingual Web site has potential for an increase in sales. If an e-commerce Web site is localized with a few of the major world languages, that is, Spanish, French, German, and Italian, there is potential for a 400% increase in sales. The benefits and advantages of having a successful multilingual Web site come from multiple levels and in various areas, and some major ones include expanded global e-commerce presence and branding, increased online visibility and accessibility, more effective channels of communication, higher and better credibility, easier customization, improved customer satisfaction, greater competitive advantage, and increased revenues and profit potential. When we all are thinking globally and acting locally, multilingual Web sites will certainly continue to remain a necessity for businesses and organizations that are

engaged in global e-commerce (Cyr & Trevor-Smith, 2004; Hillier, 2003; King, 2004; Lingo Systems, 2006; Payne, 2005; Schneider, 2005; Starr, 2005; Woldering, 2006).

MAJOR CHALLENGES FOR MULTILINGUAL WEB SITES

It is obvious that the power of the Internet is in its ability to enable people of different languages, cultures, and countries to communicate and share information. A Web site should be multilingual in order to be accessible to a larger audience, thus providing the same information in more than one language, such as Chinese, French, Italian, Korean, and Japanese. EuroNews, the first multilingual Web site in Europe, was launched on January 1, 1993, and it simultaneously covered world news from a European perspective in seven languages: English, French, German, Italian, Portuguese, Russian, and Spanish (EuroNews, 2006). A typical multilingual Web site should contain a mixture of global content and local content. The global content needs to be presented in many languages for customers all over the world and should cover product information, technical support documents, tutorials, corporate profiles, worldwide branding messages, and the design of the Web page itself. The local content has to be written for each target language audience and should include locally available products, local promotions, sales and advertising campaigns, and local points of purchase indices. While the global content is applicable everywhere and is relatively insensitive to national or cultural differences, the local content provides the most relevant information to convince users that the Web site fits in their culture (Boyd, 2006; Hopkins, 2000; Schneider, 2005; WorldLingo, 2006; Yunker, 2003). If a company wants to sell products in China, Taiwan, and the Middle East, it would be strategically risky for the company not to include information in both Simplified and Traditional Chinese, and both Hebrew and Arabic on its Web site. With a Web site only in English, the company is only aiming at a limited range of Internet customers. The change of its Web presence from monolingual to multilingual would provide the company with a greater opportunity to attract non-English-speaking online users to its Web site. With such an effort in developing and maintaining a multilingual Web site, the company would embrace endless prospects in terms of expansion and increased revenue.

Adding multilinguality to an English Web site is not as simple as it appears to be. There are various factors, either linguistic or cultural, to consider before putting informational content on a multilingual Web site. The following are a few examples of the impact of language and culture on multilingual Web sites (Boyd, 2006; Cunningham, 2005; Esselink, 2000; Payne, 2005).

• Direct translation of words, phrases, and metaphors can cause misunderstandings in the target language. Try to avoid direct translation when necessary.

394 • INFORMATION AND KNOWLEDGE WITH MOBILITY AND ETHICS

- Humorous expressions appreciated in one language may be regarded as offensive in another language. Always ask native speakers for verification.
- Pay attention to language variants. A Web site targeting Mainland China customers should use Simplified Chinese, and Traditional Chinese should be used for customers in Taiwan.
- The style of the language should fit the perceptions of the target audience. Using the wrong language for the wrong reader on the localized Web site will lead to a misunderstanding of the Web site or the company.
- It is essential to evaluate the target language, culture, and society before the information on the English Web site is transferred to the target Web site. To understand a concept or product, one culture relies heavily on information-rich writing, while another culture relies more on images. Their two cultures should be dealt with differently.

Since a multilingual Web site is more complicated than a monolingual Web site, its design and implementation brings new challenges and problems for the company as well as the developer of the multilingual Web site (King, 2004; Tonella, Ricca, Pianta, & Girardi, 2006). The major challenges for multilingual Web sites in global e-commerce are (a) language barriers, (b) cultural preferences, (c) technological difficulties, (d) technical differences, (e) political factors, and (f) legal constraints. The following are brief descriptions of these challenges with some examples.

Language Barriers

They could create obstacles to effective communication on a multilingual Web site.

- Languages around the world differ in display, alphabet, grammar, and syntactical rules. For example, such languages as European French and German do not have a oneto-one mapping between upper- and lowercase characters, while most non-Latin-character-based languages, such as Chinese, Japanese, Korean, and Vietnamese, do not even use the concept of lower- and uppercase letters (MSDN Library, 2007).
- Many idioms and expressions may have different meanings
 when literally translated into another language. Regional
 variants of the same language also exist. For example,
 Simplified Chinese is mainly used in Mainland China, and
 Traditional Chinese is mainly used in Taiwan. The French
 spoken in France is very different than that spoken in
 Canada (Goswami, 2003).

Cultural Preferences

They could lead to either a misunderstanding or a misrepresentation of content on a multilingual Web site.

People have different cultural preferences in different countries and regions. For example, Asian people are accus-

- tomed to being greeted by their surnames and could feel uncomfortable if they were addressed by their first names when visiting a Web site.
- Symbols, icons, and colors may have different associations in different cultures. For example, some icons, such as a house, a shopping cart, or a check mark, may not be appropriate or make sense in all locales (Goswami, 2003).

Technological Difficulties

They could cause problems for the development and maintenance of a multilingual Web site.

- A lack of a standard encoding language for operating systems and applications (e.g., single-byte coding for European languages, double-byte coding for East Asia languages, and bi-directional coding for Middle East languages) has made it hard to share data and even harder to support a multilingual user interface (MSDN Library, 2007).
- Bandwidth limitations can reduce accessibility to multilingual Web sites. If the Web site is graphics intensive, users may have problems loading the Web pages in countries or regions where bandwidth is more limited. A global e-commerce company could offer two versions of Web sites to compensate for slower bandwidth (Schreiber Translations, 2007).

Technical Differences

They could cause difficulties for the design and implementation of a multilingual Web site.

- Using credit cards for shopping online is a preferred payment method in North America, but not all countries adopt this preference. Japanese people avoid using credit cards, and Chinese customers do not use credit cards for online shopping. In this case, multilingual Web sites for global e-commerce must provide multiple payment mechanisms for various customers from different countries.
- There are different standards for dates, temperatures, time, telephone numbers, addresses, and units of measure. For example, the English system of weights and measures is used by people in the United States, while the metric system is used by people in rest of the world; when representing dates, people in rest of the world use DD/MM/YYYY, but people in the United States use MM/DD/YYYY (Schreiber Translations, 2007).

Political Factors

They could affect the content on and or access to a multilingual Web site.

 Politically sensitive content on a multilingual Web site may cause problems in some countries. China has very strict policies regarding what information and content can or cannot be put on a Web site. Therefore, a Web site

- targeting consumers in China may have to cut any politically sensitive content to reduce risks of offending the Chinese government.
- Some countries oppose a policy of free access to information and limit use of the Internet. For instance, any information on Falun Gong (a religious group banned in Mainland China) is prevented from being accessed or transferred. A Web site with such information would be deemed undesirable and blocked by the government (Jia, 2006).

Legal Constraints

They could affect the operation and maintenance of a multilingual Web site.

- Countries have different laws that affect global e-commerce
 in general and in particular areas such as privacy with
 respect to data collection and copyright law. For instance,
 legal information such as disclaimers, privacy policies, and
 copyright information must adhere to local market regulations and laws (Goswami, 2003).
- There are differences in treatment of free speech and international transfer of data in different countries and regions.
 For example, China would not tolerate anyone who wants to exercise freedom of expression. In June 2000, Huang Qi, the man who launched China's first human rights Web site, was arrested and accused of attempting to overthrow the state (Human Rights Watch, 2001).

DEFINITIONS OF FOUR TERMS

Before we discuss some main solutions to meet the challenges for multilingual Web sites in global e-commerce, it would be helpful to first define the following terms: (a) Web site translation, (b) Web site internationalization, (c) Web site globalization, and (d) Web site localization.

Web Site Translation

Translation means directly reproducing site text from one language into another. Although effective translation will account for differences in sentence structure or idiomatic expressions, it will not alter the substance of content. For example, the French translation of a U.K. site's customer service page will retain British contact names, phone numbers, and business hours (Goswami, 2003).

Web Site Internationalization

Web site Internationalization (I18N) can be defined as the process of developing a Web site's code base (functionality) so that its feature design and code do not make assumptions based on a single language. I18N issues include your Web site or Web-driven application's ability to (a) support non-English characters, (b) sort based on different language rules, (c) be designed keeping text separate from code, and

(d) handle different address, time, date, and numerical formats, among other considerations (Globalization Partners International, 2005).

Web Site Globalization

Web site globalization is the process of rendering a Web site in multiple languages. It goes beyond the translation of content into other languages. Ideally, the process must address localization, internationalization, country standards, symbols, currencies, geography, calendars, time zones, and a host of technically related entities like code page tables, data input methods, presentation media, and new formats for character representation (Sarkar, 2005).

Web Site Localization

Web site localization is the process of modifying an existing Web site to make it accessible, usable, and culturally suitable to a target audience. Web site localization is a multilayered process needing both programming expertise and linguistic and cultural knowledge. If either is missing, the chances are that a localization project will encounter problems (Payne, 2005).

The terms previously defined represent four different approaches to the development of a multilingual Web site in global e-commerce. As we can see from the definitions, they all share similarities as well as differences. Sarkar (2005) also thought that both internationalization and localization were subsets of globalization. Web site globalization is so much more than translating Web sites for various countries. The complexity is in the combination of local needs with corporate communication strategies. Local needs go beyond translation. They go as far as localizing company messaging and local business functionality in Web forms and applications, as well as locally targeted communication to multiple audiences through a Web site. As the process of converting written text to another language, Web site translation is regarded as one of the activities in localization, which includes translation and testing of Web content, translation and engineering of software, and project management. As with any translation and localization effort, it is not enough to simply convert text into the destination language; the success of a multilingual Web site depends on several factors, such as the content adaptation to the linguistic and cultural system of the target language, the adoption of a marketing strategy that achieves the right balance between global and local content, and the transformation of Web site components to meet the linguistic and cultural communication requirements (Esselink, 2000).

MAIN SOLUTIONS TO THE CHALLENGES FOR MULTILINGUAL WEB SITES

Based on the four important approaches to the development of multilingual Web sites in global e-commerce, the following section outlines some practical solutions to meet the challenges, focusing on language barriers and cultural preferences.

Web Site Glocalization as a Solution to Cultural Preferences

Among the four approaches previously defined, two have been widely adopted for the design of multilingual Web sites. One is Web site globalization, and the other is Web site localization. As the combination of globalization and localization, glocalization is a process of adopting specific elements from other cultures without losing the original identity, and blending the ideas, brands, and practices from different cultures in such a balanced way that one is not overwhelmed by the other. For instance, glocalization has led to the emergence of phenomena such as world music, gourmet cooking, and ethnic body adornment (Shen, Woolley, & Prior, 2006). According to Tixier (2005), "glocalization is the implementation of the constraints of globalization in accordance with the constraints of the local environment and requested by the final user" (p. 16). Here, glocalization is regarded as the third path, beside globalization and localization, to developing major multilingual Web sites for various sectors of industry in the United States, Europe, Asia, Africa, and the rest of the world. While the Web sites' structure could remain the same, the content of the Web sites could be adapted to the cultural, political, legal, behavioral, and technical aspects in the different markets or countries (Tixier, 2005). There are many examples of glocalization. For example, KFC has added to its menu such dishes as mushroom rice, chicken porridge, and seafood and vegetable soup to cater to local Chinese customers' love of rice. McDonald's Restaurants in France have replaced the familiar Ronald McDonald mascot with Asterix the Gaul, a popular French cartoon character. When applied to global e-commerce, Web site glocalization means thinking global and acting local. In a study of the Chinese Web sites of the top 100 global brands, Maynard and Tian (2004) found that a glocal strategy, as opposed to a standardized global strategy, was being practiced in cyberspace by many of the companies with top brands. These companies glocalized their Chinese Web pages by integrating local cultural characteristics into their brands' strategies, thus presenting themselves as being socially accommodating to the local market. Ideally, the glocalization process must address globalization, localization, internationalization, country standards, symbols, currencies, geography, calendars, time zones, and a host of technically related entities like code page tables, data input methods, presentation media, and new formats for character representation. Success in a global market that is made up of many different localities is more likely if products are glocalized and customized for individual local communities that have different needs and different cultural preferences (Singh & Boughton, 2005).

Machine Translation as a Solution to the Challenge of Language Barriers

Machine translation (MT) is the use of computer software to translate text or speech from one natural language into another. Like translation done by humans, MT is not simply substituting words in one language for another, but applying complex linguistic knowledge. Machine translation systems connected by the Internet may allow cross-language communication with anyone, from anywhere, and at any time. The Web-based translation makes it possible to instantly interpret regional dialects and idiomatic expressions in various languages. With the machine translation systems, products and services can be obtained or provided in a local language, thus helping international business and markets to grow and allowing local cultures and languages to thrive (Lehman-Wilzig, 2001). There are numerous companies that specialize in providing software and service for Web-based machine translation. The following are eight popular ones.

- ATA Software (http://www.atasoft.com): On the market since 1997, ATA provides an online instant text and Web site translation service between English and Arabic.
- Babel Fish (http://babelfish.altavista.com): Provided by AltaVista, Babel Fish enables the translation of short passages and Web sites between 31 language pairs.
- FreeTranslation.com (http://www.freetranslation.com):
 Powered by SDL's Enterprise Translation Server, Free-Translation offers free translations of text or Web pages in 11 languages.
- InterTran (http://www.tranexp.com/intertran/): A free Web translation service that can translate single words, phrases, sentences, and entire Web pages in 42 languages.
- myWorldLingo (http://www.worldlingo.com/en/products _services/worldlingo_translator.html): A free online language translator, provided by WorldLingo, helps users translate between 210 language pairs. It can also be used in e-mail translation.
- SYSTRAN (http://www.systransoft.com/): Founded in 1968, SYSTRAN develops leading MT technologies, and provides free online translation in one of 18 languages.
- TRADOS (http://www.trados.com): A suite of applications
 that enable users to master the many facets of translation
 work, and address the requirements of multiple front ends,
 terminology management, alignment of legacy translations, and project management. It supports more than 60
 languages.
- TranslateNow! (http://www.foreignword.com/Tools/transnow .htm): A single-point access to 28 of the best systems for over 38 different languages.

Web Site Internationalization as a Solution to the Challenge of Technical Differences

Web site internationalization refers to the process of designing an application so that it can enable easy localization

for a target audience that varies in culture, region, or language without engineering changes. It provides technologies for handling bidirectional text, language identification, accessibility issues, vertical text, non-Latin typography, date and time formats, calendars, number formats, and names. It also separates local content from global content and specifies the language of content (Becker, 2002; Cunningham, 2005; Perrault & Gregory, 2000). As pointed out by Lingo Systems' Guide to Translation and Localization. Web site internationalization takes localization issues into consideration before localization happens. It looks into issues such as writing style, page formatting, encoding for HTML, content database interfaces, trying to understand the implications that can affect the localization process. In this way, during the development stage, unnecessary complications can be avoided, and costs can be reduced during localization (Lingo System, 2006).

Lingo Systems' Guide to Translation and Localization (2006) has listed the following aspects of internationalization for multilingual Web sites:

- · Colors and graphics to avoid offending potential customers
- Dialog box wide enough to accommodate text expansion
- Functionality that supports various date, time, and currency formats
- Input and output functions to support different character sets, including double-byte characters for Chinese, Japanese, and Korean (CJK)
- Adaptable user interface to allow reading from left to right for English users and reading from right to left for Arabic users

Unicode Adoption as a Solution to the Challenge of Technological Difficulties

One of the emerging technologies associated with the creation and rendering of non-Latin alphabets is Unicode, which has been recognized and widely adopted as an international standard. As the alternative to the ASCII coding scheme, Unicode allows more than 65,000 non-Latin characters and makes storing, displaying, and accessing non-Latin characters on the Web much easier. It enables a single software product or a single Web site to be targeted across multiple platforms, languages, and countries without reengineering (Ott, 1999; Yunker, 2003). In recent years, Unicode, as a new character set coding scheme, has been implemented to include both the Simplified Chinese and Traditional Chinese characters, thus reducing problems caused by compiling and translating Chinese characters coded in different character sets (Emerson, 2000). Caldwell (2002) summarized other major advantages of Unicode in the article "Simplifying Web Content with Unicode" as follows:

Unicode provides one unified index for all characters in all common languages; a common index for transcoding among standard encodings; and a common point of reference for comparing encoded characters. It provides a tool for fixing problems such as translations that use Microsoft Code Page 1252 special characters, integrating processes that cannot change encodings, converting documents that come with no encoding tags, and converting documents to another encoding in the same language. Unicode also frees creative energies which, because they are not needed to solve transcoding problems, can be used to improve multilingual content, content management, and intercultural communications. (p. 22)

FUTURE TRENDS

The Internet has become a primary communication medium with over 1 billion users all over the world (Computer Industry Almanac, Inc., 2005; Internet World Stats, 2007a). It has brought down language barriers that previously prevented companies and individuals from marketing their products or services in global e-commerce. One of the characteristics of global e-commerce is its multilinguality, with the content on a large percentage of Web sites either non-English or a mixture of English and other languages. Therefore, the next big challenge for multilingual Web sites in global e-commerce is how to make the multilingual content retrievable by search engines, such as Google, Yahoo!, MSN, and Ask. In other words, there exists a vast online market for multilingual Web content search. Therefore, along with the booming multilingual Web site design services, there are services for multilingual search engine optimization (SEO), which is also called international search engine optimization. It is common for Internet users to not click through pages and pages of search results, so the ranking of a Web site in a search is essential for directing more traffic toward the Web site. The higher a Web site ranks in the results of a search, the greater the chance that the Web site will be visited by a user. Multilingual SEO refers to the process of changing the content and code of a multilingual Web site in order to increase its rankings in the result pages of search engines and directories. The process may involve rewriting body copy, altering Title or Meta tags, removing Frames or Flash content, building links, focusing on content optimization and code optimization, and ensuring the Web site coding validates. There are many companies and Web sites providing multilingual SEO for Web site marketing in the top 10 most popular languages identified on the Web site Internet World Stats (2007b), such as English, Chinese, Spanish, Japanese, German, French, Portuguese, Italian, Korean, and Hebrew. For a company or an individual that already has a functional global e-commerce Web site, the new challenge is not only to effectively maintain the multilingual Web site to meet the needs of existing customers, but also to constantly update the multilingual Web site to attract and retain new customers. Multilingual SEO services will certainly help the company and the individual to meet such a new challenge, thus becoming more visible and more competitive in global e-commerce.

An immediate future research opportunity is to study the impact of glocalization on non-English e-commerce Web sites, such as the e-commerce Web sites in Simplified Chinese and Traditional Chinese, focusing on the correlation of global content and local content on the Web sites. As noted in various studies on language and culture and their impact on communication, language and culture together play a very important role in global e-commerce (Boyd, 2006; Chau, Cole, Massey, Montoya-Weiss & O'Keefe, 2002; Cunningham, 2005; He, 2001; Hillier, 2003; Payne, 2005; Tsikriktsis, 2002). Also, linguistic and cultural differences as well as political and economic differences exist between Mainland China and Taiwan. Actually, the differences in language and culture are so big that they have created communication obstacles between Mainland China and Taiwan not only in everyday life but also in professional practice. People in Taiwan are more comfortable to buy things over the Internet, while people in Mainland China are more reluctant to go online shopping, because Taiwan's culture and lifestyle are much more influenced by Western culture and ideology. Such differences in language and culture between Mainland China and Taiwan could create differences in language translation and culture adaptation when English Web sites are glocalized in Simplified Chinese and Traditional Chinese with respect to local content. This project analyzes glocalized Web sites of the two best beverage brands, Coca-Cola and Pepsi, focusing on the problems of language translation and culture adaptation in local content. The quality of the two companies' glocalized Web sites in Simplified Chinese and Traditional Chinese are compared and contrasted in terms of their similarities and differences in language structures and culture elements, thus providing helpful insights into the evaluation of the content and structures of glocalized Web sites for global e-commerce. Based on the cross-cultural and cross-lingual comparison of the glocalized e-commerce Web sites of Coca-Cola and Pepsi, this project will not only reveal interesting findings on two multinational companies' glocalized Web sites in terms of language translation and culture adaptation, but also provide helpful insights into multilingual Web site evaluation for global e-commerce. Furthermore, this project will show that building a quality multilingual Web site is closely related to Web site translation in different languages as well as the proper glocalization of Web sites for their target audience and market, with respect to language and culture differences. In addition, this project will provide an in-depth discussion on some interesting aspects of Web site glocalization in global e-commerce, focusing on the main challenges and major dimensions.

CONCLUSION

This chapter has provided an in-depth discussion on some interesting aspects of multilingual issues in global e-commerce Web sites, focusing on the main challenges and

major solutions. Also, issues related to multilingual SEO are discussed as future trends. We have shown that developing and maintaining a multilingual Web site is indispensable for individuals and companies wishing to compete in global e-commerce. With the Internet population becoming more and more multilingual, there will be a greater demand for new information technologies and services to provide solutions to meet the challenges brought up by language barriers, cultural preferences, technological difficulties, technical differences, political factors, and legal constraints. Therefore, it is imperative that we have a better understanding of the issues related to multilingual Web sites so that we can remain one step ahead of the competition in global e-commerce.

REFERENCES AND FURTHER READINGS

- Appleby, S. (2003). Multilingual information technology. *BT Technology Journal*, 21(1), 75–83.
- Becker, S. A. (2002). An exploratory study on Web usability and the internationalization of US E-businesses. *Journal of Electronic Commerce Research*, *3*(4), 265–278.
- BNET Business Dictionary. (2007). *Glocalization*. Retrieved September 8, 2007, from http://dictionary.bnet.com/definition/glocalization.html
- Boyd, D. (2006). *G/localization: When global information and local interaction collide*. Paper presented at the O'Reilly Emerging Technology Conference, March 6, 2006, San Diego, CA. Retrieved September 8, 2007, from http://www.danah.org/papers/Etech2006.html
- Caldwell, J. T. (2002). Simplifying Web content with unicode. *Multilingual Content Management*, Suppl. 45, 21–23.
- Chau, P. Y., Cole, M., Massey, A. P., Montoya-Weiss, M., & O'Keefe, R. M. (2002). Cultural differences in the online behavior of consumers. *Communications of the ACM*, 45(10), 138–143.
- Computer Industry Almanac, Inc. (2004). *PCs in-use surpassed* 820M in 2004. Retrieved September 8, 2007, from http://www.c-i-a.com/pr0904.htm
- Crystal, D. (2001). Weaving a web of linguistic diversity. *Guardian Weekly*, January 25, 2001. Retrieved September 8, 2007, from http://www.guardian.co.uk/GWeekly/Story/0,3939,427939,00.html
- Cunningham, A. (2005). *Towards a multilingual content infrastructure*. Retrieved September 8, 2007, from http://conferences.alia.org.au/online2005/papers/c9.pdf
- Cyr, D., & Trevor-Smith, H. (2004). Localization of Web design: An empirical comparison of German, Japanese, and United States Web site characteristics. *Journal of the American Society for Information Science and Technology*, 55(13), 1199–1208.
- DePalma, D. (2006). Why Website globalization should matter to international businesses. Retrieved September 8, 2007, from http://www.webpronews.com/expertarticles/2006/10/06/why-website-globalization-should-matter-to-international-businesses
- Dempsey, G., & Sussman, R. (1999). A hands-on guide for multilingual Websites. *World Trade*, *12*(9), 68–70.

- Emerson, T. (2000). Segmenting Chinese in unicode. *Proceedings of the 16th International Unicode Conference*. Retrieved September 8, 2007, from http://seba.ulyssis.org/thesis/papers/iuc16.pdf
- Enos, L. (2001). Report: English-only a mistake for U.S. sites. Retrieved September 8, 2007, from http://www.ecommerce times.com/story/9812.html
- Esselink, B. (2000). *A practical guide to localization*. Philadelphia: John Benjamins Publishing.
- EuroNews. (2006). Many voices one vision. Retrieved September 8, 2007, from http://www.euronews.net/feedback/en/MP_2007 Eng.pdf
- Ghanem, N. M. (2001). *Developing Website for users of languages other than English*. Retrieved September 8, 2007, from http://www.otal.umd.edu/uupractice/non_english/
- Global Reach. (2004). Evolution of Online populations. Retrieved September 8, 2007, from http://global-reach.biz/globstats/evol.html
- Globalization Partners International. (2005). Website Internationalization. Retrieved September 8, 2007, from http://www.globalisationpartners.com/Translation_Services/General/PDF/website-internationalization.pdf
- Goswami, A. (2003). Perspectives on E-globalization. *Digital Web Magazine*. Retrieved September 8, 2007, from http://www.digital-web.com/articles/perspectives_on_e_globalization/
- He, S. (2001). Interplay of language and culture in global E-commerce: A comparison of five companies' multilingual Websites. In S. Tilley (Ed.), Communicating in the new millennium, Proceedings of the 19th Annual International Conference on Systems Documentation (pp. 83–88). New York: The Association for Computing Machinery.
- He, S. (2007). Internet multilinguality: Challenges, dimensions and recommendations. In K. St. Amant (Ed.), *Linguistic and cultural online communication issues in the global age* (pp. 1–14). Hershey, PA: IGI Global.
- Hillier, M. (2003). The role of cultural context in multilingual Website usability. *Electronic Commerce Research and Applications*, 2(1), 2–14.
- Hopkins, R. (2000). Website translation: A primer for Webmasters, authors and owners. Retrieved September 8, 2007, from http://www.glreach.com/eng/ed/art/trans.html
- Human Rights Watch. (2001). Freedom of expression and the Internet in China: A human rights watch backgrounder. Retrieved September 8, 2007, from http://www.hrw.org/backgrounder/asia/china-bck-0701.htm
- Internet World Stats. (2007a). Internet usage by world region. Retrieved September 8, 2007, from http://www.internetworldstats.com/stats.htm
- Internet World Stats. (2007b). Top ten languages used in the Web. Retrieved September 8, 2007, from http://www.internetworldstats.com/stats7.htm
- Jenkins, M. (1997, July 8). The Web learns to speak in tongues. *Independent*, p. 4.
- Jia, M. (2006). Impact of Internet on Chinese authoritarian rule during SARS and Falun Gong incidents. Retrieved September 8, 2007, from http://www.democ.uci.edu/research/ conferences/gradconf/democracyanditsdevelopment/ jiapaper. pdf
- Khan, A. L. (2002). *Multilinguality support for a maritime online portal*. Retrieved September 8, 2007, from http://www.sts.tu-harburg.de/people/pa.hupe/studenttheses/KhanSP.pdf

- King, K. S. (2004). Challenging Web design and cultural issues in international E-commerce sites. In P. Cunningham & M. Cunningham (Eds.), eAdoption and the knowledge economy: Issues, applications, case studies (pp. 174–179). Amsterdam: IOS Press.
- Knoppers, J. V. T. (1998). Global electronic commerce through localization and multilingualism. *Computer Standards and Interfaces*, 20(2), 101–109.
- Lehman-Wilzig, S. (2001). Babbling our way to a new Babel: Erasing the language barriers. *The Futurist*, 35(3), 16–23.
- Levy, M. (2001). E-Volve-or-Die.com: Thriving in the Internet age through E-Commerce management. Indianapolis, IN: New Riders Publishing.
- Li, D. (2004). Do in China as the Chinese do: An overview of KFC's localization strategies in China. Retrieved September 8, 2007, from http://blog.lidan.net/2004/04/kfcs_localization_ strategies_in_china.html
- Lingo Systems. (2006). The guide to translation and localization: Communicating with the global marketplace (6th ed.). Retrieved September 8, 2007, from http://www.lingosys .com/guidebook/6th%20Edition%20Guidebook.pdf
- Maynard, M., & Tian, Y. (2004). Between global and glocal: Content analysis of the Chinese Web sites of the 100 top global brands. *Public Relations Review*, *30*(3), 285–291.
- MSDN Library. (2007). *Language issues*. Retrieved September 8, 2007, from http://msdn2.microsoft.com/en-us/library/aa292134(VS.71).aspx
- Nantel, J., & Glaser, E. (2004). Multicultural commercial Websites: When translating might not be enough. In P. Cunningham & M. Cunningham (Eds.), *eAdoption and the knowledge economy: Issues, applications, case studies* (pp. 167–173). Amsterdam: IOS Press.
- Ott, C. (1999). Global solutions for multilingual applications: Real world techniques for developers and designers. New York: John Wiley and Sons.
- Parr, B., & McManus, M. (2000). Web-site globalization: The next imperative for the internet 2.0 era. Retrieved September 8, 2007, from http://www.etranslate.com/en/downloads/IDC_Globalization_report.pdf
- Payne, N. (2005). *Culture and Website localization*. Retrieved September 8, 2007, from http://ezinearticles.com/?Culture-and-Website-Localization&id=832
- Perrault, A. H., & Gregory, V. L. (2000). Think global, act local: The challenges of taking the Website global. *International Journal of Special Libraries (INSPEL)*, 34(3/4), 227–237.
- Reynolds, J. (2004). The complete E-commerce book: Design, build, and maintain a successful Web-based business. San Francisco: CMP Books.
- Sarkar, Z. A. (2005). Web globalization solutions (Universal Solutions, Inc. White Paper). Retrieved September 8, 2007, from http://www.babelx.com/Eng/solution/Globalization ManagementSystem.pdf
- Schneider, G. (2005). *Electronic commerce*. Boston: Course Technology.
- Schreiber Translations, Inc. (2007). *Beyond localizing—Related issues*. Retrieved September 8, 2007, from http://www.schreibernet.com/translation-101/articles/globalizing-yourwebsite-4.htm
- Seilheimer, S. (2004). Productive development of World Wide Web sites intended for international use. *International Journal of Information Management*, 24(5), 363–373.

- Seilheimer, S. (2004). Productive development of World Wide Web sites intended for international use. *International Journal of Information Management*, 24(5), 363–373.
- Shen, S.-T., Woolley, M., & Prior, S. (2006). Towards culturecentred design. *Interacting with Computers*, 19(2), 1–33.
- Singh, N., & Boughton, P. (2005). Measuring Website globalization a cross-sectional country and industry level analysis. *Journal of Website Promotion*, 1(3), 3–20.
- Starr, J. (2005). Design considerations for multilingual Web sites. *Information Technology and Libraries*, 24(3), 107–116.
- Stoyanova, T. (2005). *Multilingual sites and search engines: Part 1*. Retrieved September 8, 2007, from http://www.seochat.com/c/a/Search-Engine-Optimization-Help/Multilingual-Sites-and-Search-Engines-part-1/
- Thebigword.com. (2006). Fortune 500—Multilingual Websites. Retrieved September 8, 2007, from http://www.thebigword.com/Fortune500MultilingualWebsites.aspx
- Tixier, M. (2005). Globalization and localization of contents: Evolution of major internet sites across sectors of industry. *Thunderbird International Business Review*, 47(1), 15–48.
- Tonella P., Ricca F., Pianta E., & Girardi C. (2006). Automatic support for the alignment of multilingual Web sites. *Journal of Software Maintenance and Evolution: Research and Practice*, 18(3), 153–179.

- Tsikriktsis, N. (2002). Does culture influence Web site quality expectations? An empirical study. *Journal of Service Research*, 5(2), 101–112.
- Vogt, S. (2003). Going native to get global. *Information World Review*, 191, 18–19.
- Westland, J. C., & Clark, T. H. (2002). Global electronic commerce: Theory and case studies. Boston: The MIT Press.
- Woldering, B. (2006). Connecting with users: Europe and multilinguality. Retrieved September 8, 2007, from http://www.valaconf.org.au/vala2006/papers2006/95_Woldering_Final.pdf
- WorldLingo. (2006). *Instant Website translator FAQ*. Retrieved September 8, 2007, from http://www.worldlingo.com/en/products/iwt faq.html
- Würtz, E. (2005). A cross-cultural analysis of Websites from high-context cultures and low-context cultures. *Journal of Computer-Mediated Communication*, *11*(1), Article 13. Retrieved September 8, 2007, from http://jcmc.indiana.edu/vol11/issue1/wuertz.html
- Yunker, J. (2003). Beyond borders: Web globalization strategies. Indianapolis, IN: New Riders Publishing.

Managing Intangible Capital

MICHAEL M. BEYERLEIN

Purdue University

Frances A. Kennedy

Clemson University

ompetitive advantage and sustaining and growing the business, depends on the use and development of assets or capital—tangible *and* intangible. A vast literature exists on the topic of managing the tangible capital but management of the intangible is a recent topic. Competition in the 21st century depends on it. "Intangible assets—patents and know-how, brands, a skilled workforce, strong customer relationships, software, unique processes and organizational designs, and the like—generate most of a company's growth and shareholder value" (Lev, 2004). In firms like Microsoft, intangibles account for 80 to 90% of the value of the corporation (Crainer, 2000; Lev, 2004).

Capital represents resources or assets—either tangible or intangible—that can be used to produce more capital or wealth. Capital refers to any long-lived asset into which other resources can be invested, with the expectation of a future flow of benefits. The value of the company is the value of all its forms of capital minus its liabilities. Organizations rely on both tangible and intangible forms of capital but have traditionally focused on the tangible-financial (e.g., money and credit) and physical assets (e.g., buildings and equipment). Although intangible resources (e.g., knowledge, skill, and motivation) have clearly been recognized and manipulated informally throughout history, deliberate attention to their role in the organization has only emerged in the past decade. Intellectual capital has been the primary focus, perhaps because of the transformation of the economy from a predominantly production-based to a knowledge-based system. However, a large number of other types of intangible capital have been described in recent research journal articles since then including social, relationship, political, customer, organizational, human structural, process, knowledge market, innovation, and collaborative. This chapter presents various forms of intangible capital and why their development is important to maintaining competitive. An example using a new product development process illustrates how multiple intangible capitals combine for success product introduction and highlights how even a very few deficits in intangible capital can jeopardize success.

WHAT IS THE ISSUE?

The term *capital* has connotations that lead people to think automatically of the tangible. Indeed, *Merriam Webster's Collegiate Dictionary* (2007) defines capital as "Material wealth in the form of money or property that is used to produce more wealth." This stems from a period in time where financial capability—and the assets it could buy—was considered the key to competitive advantage. A company with resources could take greater advantage of new technology, sink money into expanding new markets, and invest heavily in new product development. Indeed, capital is one of the three factors of production in classical economic theory (the others being materials and labor).

The current reality of competitive advantage, however, is that companies compete by creating value for their customer. There is an urgent need to

- deliver more products and services faster, cheaper, and at higher quality;
- sustain and enhance gains—building on achievement to attract, keep, and inspire the best people/talent;
- · be the supplier of choice as supplier numbers decline;
- thrive on multiyear contracts with annual price reductions—now generating economywide impact; and
- compete and win—anywhere—now and in the future.

Companies focus on differentiating their product or service from competitors by developing a strategy that leverages their strengths and targets their particular market niches. This differentiation occurs in one or more of the following three areas: quality, cost, and time. Quality encompasses the customer's entire experience with a product and includes innovativeness, durability, desired features, characteristics, and postsales service. Cost includes the life cycle costs from supplier, production and distribution costs, and customer maintenance and disposal costs. Time involves time-to-market of new products, availability, and time through the production and distribution chain. Financial resources alone will not ensure effectively competing in these dimensions. Tangible capital alone will not help companies to compete successfully. Succeeding in these dimensions requires an intimate knowledge of processes and their interactions with other parts of the value chain. Excelling in these areas absolutely requires resources beyond monetary capital-it hinges on developing and leveraging another type of capital—intangible capital.

WHAT FORMS DOES THE INTANGIBLE TAKE?

A business (any business) is composed of nothing but processes. Management is responsible for process definition, tracking, and improvement. Most managers fail to understand this concept and instead rely on firefighting. (Hafey, 2007, slide 262)

The firefighting behavior just described is all too common in companies under intense pressure and starved for resources. It reflects a philosophy of "reaction" rather than "proaction." It is survivalist and is not a winning strategy. To understand the role of management better as proaction, we need to go back to the basics of the work. The definition of *work* is "the physical or mental effort or activity directed toward the production or accomplishment of something" (*Free Dictionary*, 2007). Note that work can be physical or mental and that work changes something from one condition to another. The goal of business is to transform raw materials into a valuable product or service. This transfor-

mation is work—the conversion of material, talent, and knowledge through physical and mental effort to produce a product deemed valuable by the customer.

Work is physical or mental, but it is seldom purely one or the other. There are three types of work: physical, administrative, and knowledge. Physical is the mechanical "doing" such as repairing machines, building a house, or performing surgery, and it requires a greater degree of physical effort. Administrative work includes the support processes such as processing purchase requests or executing personnel actions, and it requires physical effort to a lesser degree. Knowledge work is the thinking process required to change data and information from one condition to another. Examples of knowledge work include program management, engineering, and planning—these require the least amount of physical work but the greatest amount of mental work.

Managing work involves managing the conversion process—whether it is the physical transformation of material into product or the conversion of data and information into knowledge and processes. The conversion process is the key to profitable performance and the key to differentiating one company, department, or program from another. Each company strives to imprint its unique contribution through excellence in the conversion process.

The management initiative that revolves around the belief that all work is done in processes is lean thinking. The foundation for lean thinking is the understanding that value is determined by the recipient of the output of work processes—customers inside and outside the organization. Lean thinking consists of five principles—value, value stream, flow and pull, empowerment, and perfection—all of which guide decisions to improve flow while producing a quality product on time (Womack, 1996).

If management of processes is the core of business, where do intangible assets fit? Figure 89.1 presents the classic input-process-output model and depicts five intangible forms of capital as integral to an overarching concept called *process capital*. Process capital involves both internal and external assets of the organization. Before intangible capital can be managed, we must first look at the various categories of intangible capital and at how they interact to convert material and data into valued customer product and services.

The diagram in Figure 89.1 shows key processes and key forms of the company's assets. The diagram as a whole represents the conversion process as the key intangible. Inputs including materials, money, equipment, ideas, information, energy, and vision are transformed into outputs that customers value (outputs that are not valued are waste). Process capital is the key to organizational effectiveness. The way assets are used, grown, stored, and combined determines how much value is produced.

Intellectual Capital

Assessing, developing, and protecting the intangible assets is critical to the viability of the company. For ex-

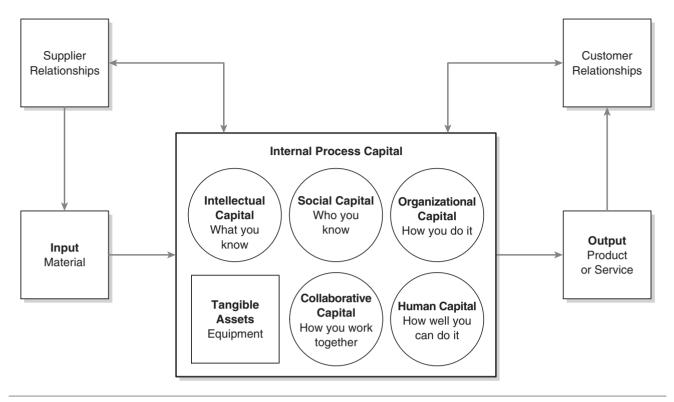


Figure 89.1 Intangible Capitals and the Development of Customer Value

ample, voluntary and involuntary turnover represents intellectual assets walking out the door. When AT&T layed off 40,000 employees in 1996, they lost an estimated 4 to 8 billion dollars in intellectual capital—equivalent to destroying one third of the physical assets of the organization (Stewart, 1997). Some writers have argued that intellectual capital is the key to intangibles, whereas others have argued that social capital is the key. Certainly, they are intertwined, since a great idea has no value if no one is interested in it.

Intellectual capital represents knowledge but that comes in many forms and its value depends on many factors. Knowledge may be what an individual knows or a routine in the organization that has evolved through practice over a long period. It includes information in files and computers but also informal lessons learned that are passed on from one person to the next through stories that illustrate how the company operates. Ulrich (1998) wrote that intellectual capital is the product of competence and commitment but others have added terms to his equation including communications, collaboration, and courage (Sage, 2002). This function implies that "knowing what" and "knowing how" are not enough. Knowledge must be shared, and there must be a basis for taking actions and taking intelligent risks with that knowledge. Intellectual capital includes pushing the envelope—creativity and innovation.

Microsoft is a well-known example of a highly innovative and successful firm. Ward (2007) described the intangible assets of Microsoft as including the knowledge

and skill of its programmers, the software they write, the licenses through which the software is protected and made available to the marketplace, and the share of the market held by that software. These all result in making Bill Gates the richest person in the country and Microsoft one of its most successful companies.

Intellectual capital is an asset that appreciates under the right conditions. Enabling conditions include a work environment where people have access to information, time to think, comfort in sharing, rewards for discovery, and so forth. "Knowledge is a resource locked in the human mind—creating and sharing it are intangible activities that can neither be supervised nor forced out of people—they only come voluntarily" (Ehin, 2000, p. 10).

Organizational Capital

The how or process of transforming inputs into outputs varies both in type and quality. Outstanding companies have found ways to set up their processes that are unique or that outperform competitors. Phrases like *world class, best in class,* and *best practices* describe the quality aspect. Unique organizational design also creates competitive advantage. Examples include Nike, Dell, and Toyota, which are well known companies that found ways to design internal and external processes that provided competitive advantage. When new organizational form succeeds in the marketplace, other companies rush in to copy it. The most copied company in the past decade is probably Toyota. Even though Toyota is

a manufacturing company, its processes have been widely copied in many industries including health care, retail, and service, particularly its lean philosophy, but in spite of rigorous efforts to emulate Toyota, U.S. auto manufacturers continue to lose market share. Copying is not enough; adapting someone else's design innovations may not be enough either. Innovations have to fit the context in which the company operates.

Organizational capital resources include reporting structures, formal and informal planning processes, administrative and management systems, and informal relationships among groups within the firm and between the firm and its environment (Tomer, 1987).

Human Capital

The cost of replacing an employee ranges from one to four times his or her annual salary. The range has to do with the employee's level of expertise. The higher the skill level is, the more value the employee can add, and therefore, the more difficult replacement becomes. Replacement cost is one way of thinking about human capital, one way to quantity it. Another way to develop human capital is through learning. Employees learn both formally (e.g., training sessions) and informally (e.g., experience and coaching). As they pick up new knowledge, their ability to contribute to the organization grows-they become more valuable assets. The knowledge they develop is usually knowing what to do and knowing how to do it, but knowing and caring why they should do it are also important (Quinn, 1996). Others break the task of developing employee knowledge into three categories: technical, interpersonal, and business. Technical training has typically gotten the biggest share of the budget, but as intangible assets are more valued, training in interpersonal and business knowledge should get more attention.

There are five tools for increasing human competence in a firm, site, business, and plant:

- 1. Buy the competence by hiring new talent.
- 2. Build the competence by investing in employee learning and training.
- Borrow the competence by hiring consultants and forming partnerships with suppliers, customers, and vendors to share knowledge, create new knowledge, and bring in new ways to work.
- 4. Bounce the incompetence by removing those employees who fail to change, learn, and adapt.
- 5. Bind the competence by finding ways to keep the most valuable workers.

Companies need to acquire competent employees, and they need to foster employees who are not only competent but also committed. Employees with too many demands and not enough resources to cope with those demands quickly burn out, become depressed, and lack commitment. A company can build commitment in three ways:

- Reduce demand on employees by prioritizing work, focusing only on critical activities, and streamlining work processes.
- b. Increase resources by giving employees control over their own work, establishing a vision for the company that creates excitement about work, providing ways for employees to work in teams, creating a culture of fun, compensating workers fairly, sharing information on the company's longrange strategy, helping employees cope with the demands on their time, providing new technologies, and training workers to use it.
- c. Turn demands into resources by exploring how company policies may erode commitment, ensuring that new managers and workers are clear about expectations, understanding family commitments, and having employees participate in decision making.

Ulrich (1998) argued that fostering competence and commitment together is the only way a company can ensure the growth of intellectual capital.

Social Capital

The flow of information through the organization is as fundamental to company health as the flow of blood through one's body. The flow of information is influenced by several factors including formal structure, process, culture, and goals. However, the most central factor in creating value out of the flow of information is relationship between the individuals involved in the work. Contrast people in one organization where competition, suspicion, and fear dominate, so information is hoarded with people in another organization where trust, open mindedness, and sharing dominate. The second organization has an intangible competitive advantage that is often called *social capital*.

"SC (social capital) refers to features of social organizations such as networks, norms, and social trust that facilitate coordination and cooperation for mutual benefit" (Cohen & Prusak, 2001, p. 3). The effectiveness of the network depends on who talks to whom about what and in what style. The relationships can be informational, personal, emotional, or a combination.

Social capital is present in any sharing situation including the grapevine, a community of practice, a learning community, chats at the "watercooler," a "good-old-boys" network, and so forth. Social networks are webs of relationships where each person is a node or knot in the web and the relationships are links. The information travels from one node or person to another over the links. Social capital could be considered the total health of the network or the combined capacity of the links. The capacity of links depends on trust more than on anything else. Trust means the people in the network believe they can depend on each

other to do their share, be prepared and knowledgeable, make a reasonable effort, keep confidences, share accurately and fully what is important to the situation, provide honest and constructive feedback, and willingly contribute to each other's success. Trust is close to zero in a company that bases operations on fear. For example, consistency in applying policies and public disclosure of policies and practices creates a stable environment that engenders trust, which then increases social capital and thereby increases flexibility and adaptability of the organization. Organizations benefit from this development, realizing the efficiency of reduced turnover and increased openness to change, which results from heightened job security (Leana & Van Buren, 1999). Together, organizational stability and shared understanding provide a greater coherence of organizational action (Adler & Kwon ,2002).

Trust, social capital, and healthy networks emerge over time. They are intangible but critical elements of an effective organization. High levels of social capital are associated with longer job tenure and higher trust, affect the adoption of flexible work practices, and promote innovation (Leana & Van Buren, 1999). The more an organization depends on the creativity and collaboration of employees, the more instrumental levels of trust are to achieving organizational success (Adler & Kwon, 2002).

Collaborative Capital

Assets can be hoarded and destroyed or grown and leveraged. For example, when one employee has knowledge that gives some personal advantage, he or she may choose to hoard it to keep the advantage or choose to share it because of the way it adds value to the overall effort. Leveraging of knowledge occurs most often with collaboration—a willingness to share, to support each other, and to build on each other's efforts. Collaborate capital is a special case of process capital—the resources it takes to work together readily to leverage individual knowledge and ability.

Collaboration occurs in small groups, but the members of those groups may represent a variety of specialties, functions, or companies. Collaboration ranges in scope from a work team to a major joint venture. In each case, the process of interaction is managed in such a way that the assets each individual brings to the work can be accessed and built on by the other members for the benefit of all. The collaborative process enables intellectual capital and social capital to grow. The organizational design creates conditions for collaboration. Each type of capital feeds into the others.

Refer to Figure 89.1 again. This input-process-output model applies to any company delivering any product or service. This is because all processes require input in the form of material and components or data and information. All processes have a customer as well that makes use of the product, service, or reports. This particular model adds feedback loops from both customers and suppliers. These relationships are absolutely critical in order to remain competitive. Company representatives must have intimate

knowledge of rapidly changing customer requirements in order to retain current customers and attract new customers. Company representatives must also have great rapport with suppliers in order to stay abreast of the most innovative materials and processes, as well to negotiate great prices and delivery terms.

As mentioned earlier, several forms of intangible capital, combined with tangible assets, together apply value by transforming inputs to a valuable output. Whereas any tangible asset can produce a product, without expert knowledge concerning how to make the product appealing to customers, the company will fail to thrive and, indeed, may dissolve. For example, a company may have a winning product idea, but does not.

WHY MANAGE THE INTANGIBLE?

All five of these intangible capitals work together to enable an organization to hire and keep competent employees, foster a creative and innovative culture, and develop the infrastructure necessary to support and maintain a world class organization that consistently outperforms its competitors. The development and rollout of a new product is a good example of a process that touches all parts and functions of a firm. Table 89.1 presents a matrix that describes how each form of intangible capital is integral to each activity from idea generation through development and production of the product.

For example, the first activity in the process is the emergence and sharing of a new product idea. Anyone in the organization may come up with a new product idea and share it with those who can carry that idea forward. Hiring practices attract creative and skilled people capable of generating innovative ideas (intellectual capital). There is an increased probability of capturing that idea if there is a mechanism in place readily accessible to the employee such as a suggestion program or intranet (organizational capital). Providing employees the opportunity to expand their knowledge base and increase their capabilities through relevant and accessible training will foster greater possibility of new ideas emerging in future (human capital). Research indicates that a greater number of ideas are generated in groups and the quality of those ideas increases through discussion. Encouraging both formal and informal opportunities to share and brainstorm encourages these productive interactions (social capital). Finally, an open and positive culture reinforces and may even reward the generating and sharing of new ideas (collaborative capital). Reviewing the other eight activities in the new product development process reveals similar impacts of intangible capital. All of these interactions are essential to a new product development process that generates a great product in a short amount of time that targets customer needs at the right price and manufacturing cost.

But what if any of the intangible capitals are underdeveloped? Table 89.2 presents the same matrix but highlights

Table 89.1	Intangible Capital Cor	ntributions to Succes	ssful Product Develop	pment		
Who?	Activity Description	Intellectual What you know	Organizational How you do it	Human How well you do it	Social Who you know	Collaborative How you work together
Anyone	Idea emerges and is shared	Hiring practices attract crea- tive and skilled people	Intranet, roundtable idea sharing, and sug- gestion programs	Frequent and relevant training programs accessible to all employees	Opportunities for water cooler brain- storming	Positive, reinforcing culture; encourages openness and sharing of ideas
New product development team	Designers and engineers give the idea form	Hiring and retaining highly skilled and experienced people; patents acquired	Concurrent engineering	Promote contin- uing education in new materi- als, processes and customer service	Information is shared among technically skilled people	Respect and work well with people from other areas with ideas
	Marketers test it with customers, provide feedback, and esti- mate market price	Hiring and retaining highly skilled and experienced	Involving cus- tomers during the planning process	Experience acquired from prior product introductions	Trusting relationships with buyers and customers foster honest critique	
	Accountants calculate the allowable cost to make the product, develop performance measures, and moni- tor progress	people	Formal and informal management information systems and techniques	increases exper- tise in determin- ing customer needs, meeting performance schedule and milestones, and promotes successful and timely imple- mentation	Trusting and helpful relationships encourage honest and helpful appraisals	
	Engineers and manufacturing develop production process, constructs molds, etc.		Concurrent engineering		Relationships with outside contractors help to develop the best processes and components	
	Purchasing seeks partnerships with suppliers who pro- vide input on materials		Involving purchasing during the planning process		Trusting relationships foster a shared success resulting in the best price and delivery options	
Production facility	Equipment is in place, tested for cycle time and quality		Structural mechanisms overlap NPD team with implementation team		Cross-functional teaming in faci ity enables quick start up and efficient trouble-shooting	
	People are cross trained to work on various equipment in production cell	Hiring and retaining a flexible workforce	Formal and informal training programs; empowerment	Training and retaining employees with flexible skills is	Cell team members cross-train to increase flexibility and help each other as needed to maintain a smooth work flow; empower-	
	Product is manufactured and shipped to customer	Hiring highly skilled and experienced people	Same day ship- ping of product as an order is completed in production	an asset facili- tating successful implementation ing workers with information authority to make necondecisions		

Table 89.2	Deficiencies in Inta	angible Capital Create	Obstacles to Succes	ssful Product Develop	oment	
		Intangible Capitals				
Who?	Activity Description	Intellectual What you know	Organizational How you do it	Human How well you do it	Social Who you know	Collaborative How you work together
Anyone	Idea emerges and is shared	Hiring practices attract crea- tive and skilled people	Intranet, roundta- ble idea sharing, and suggestion programs	Frequent and relevant training programs accessible to all employees	Opportunities for water cooler brain- storming	Autocratic culture discourages idea development by anyone other than NPD team
New product development team	Designers and engineers give the idea form	Hiring and retain- ing highly skilled and experienced people; patents acquired	Concurrent engineering	Promote continuing education in new materials, processes and customer service	Information is shared among technically skilled people	Respect and work well with people from other areas with ideas
	Marketers test it with customers, provide feedback, and estimate mar- ket price	Hiring and retain- ing highly skilled and experienced people	Involving customers during the planning process	Frequent turnovers in experienced employees means that	Trusting relationships with buyers and customers foster honest critiq	
	Accountants calculate the allowable cost to make the product, develop performance measures, and monitor progress		Formal and informal management information systems and techniques	each product introduction is like reinventing the wheel with repeated trial and error	Trusting and helpful relationships encourage honest and helpful appraisals	
	Engineers and manufacturing develop production process, constructs molds, etc.		Concurrent engineering		Relationships with outside contrators help develop the best process and components Trusting relationships foster a shared success resulting in the best price and delivery options	
	Purchasing seeks partnerships with suppliers who provide input on materials		Involving purchasing during the planning process			
Production facility	Equipment is in place, tested for cycle time and quality		NPD team hands off product implementation to facility and lets them implement without them		Cross-functional teaming in facility enables quick start up and efficient trouble-shooting	
	People are cross trained to work on various equipment in production cell	Hiring and retaining a flexible workforce	Formal and informal training programs; empowerment	Training and retaining employees with flexible skills is	Cell team members cross-train to increase flexibility and help each other as needed to maintain a smooth work flow; empower-	
	Product is manufactured and shipped to customer	Hiring highly skilled and expe- rienced people	Same day ship- ping of product as an order is completed	an asset facilitating successful authority to make necessary decisions		

three different areas where there is a deficiency in an intangible capital. In this scenario, the culture is autocratic and does not solicit participation from all employees (collaborative capital deficiency). As a result, employees stick to the responsibilities of their job and an unknown number of great ideas are lost forever. Consequently, the burden of idea generation falls solely to the product development team and, more specifically, probably the marketing representative.

This autocratic, functional environment permeates the organization and impacts other areas as well. This more stifling culture is not conducive to retaining good employees and results in the loss of experienced personnel (human capital deficiency). The knowledge learned through prior product introductions is lost and this loss makes subsequent new product introductions more difficult and lengthy, riddled with obstacles to overcome. The silo mentality fostered by autocratic cultures is also most likely to cause the bumpy handoff of the new product plan to manufacturing (organizational capital deficiency). Whereas before the development team would assist manufacturing in implementing and rolling out the product, in an environment of individual functions and autocracy, there is a more abrupt handoff that most likely will result in a staggering start-up and possible delayed shipments and cancelled orders.

This example of the negative impact of intangible capital deficiencies on product development extends to all processes within an organization. The three highlighted deficiencies are not isolated, but they would influence the development of other areas of intangible capital as well, creating obstacles throughout all processes.

WHAT ARE THE PAYOFFS?

Each form of intangible capital pays off in different ways, although some of the ways look similar and some combinations are possible. The following lists summarize payoffs for each of the five types.

Intellectual capital is both an organizational and an individual asset. The individual can use it to compete for jobs, promotions, and raises and to build relationships that increase his or her social capital. The social network is a critical tool for keeping one's intellectual capital up to date and for finding opportunities for converting it to tangible assets. The organization embodies its intellectual capital in copyrights, patents, products, services, processes, and routines. Organizational intellectual capital is convertible into tangible assets through the sale of products and services and information and into intangibles such as organizational capital through improved ways of organizing and human capital through experts educating new comers.

Social capital is represented by the scope and quality of the network of relationships developed by the company and its members. The network of external relations provides access to information, which helps grow IC, power, and solidarity and which provides a means of strengthening the group's identity and enhancing its capacity for collective action. In that way, social capital relates to collaborative capital. Improved relationships can compensate for a lack of financial or human capital by "who you know and how you know them." At the organizational level, social capital is enabling a change in how supply chains work by providing the basis for a shift from contract-based transactions to trust-based transactions which speed up the agreement process and streamline the flow of goods and information. The reputation of the company is another example of social capital that relates to trust and therefore enhances transactions with customers and suppliers. The strength of good relationships shows clearly when contrasting the flow of information between insiders (bonding social capital) in contrast to that with outsiders (bridging social capital). Social capital is a characteristic of a relationship, so if either person or either organization breaks the trust that has been grown over time, the value of the social capital drops toward zero (Adler & Kwon, 2002).

Rich literatures have developed in the past couple of decades around various aspects of organizational capital (Lawler & Mohrman, 2003). The resource-based theory of the firm, which argues that competitive advantage depends on developing internal core competencies, provides one solid example of theory. Best practices provide an example of practical benchmarking where companies try to learn from each other to build those competencies. In each case, the goal is to improve internal processes by making changes in the way the business is organized. Many types of process improvements have been invented, tested, and shared. The successful ones add efficiency and effectiveness to the organization, which represents organizational capital. The methods evolve over time as new experiments in organizing are tried. For example, a focus on quality several decades ago developed into total quality management, which became continuous improvement that led to lean manufacturing and six sigma—each an evolution in thinking, processes, and tools that enhances organizational capital. The competition is so fierce in some industries that enhancing organizational capital by a few percent can mean the difference between survival and bankruptcy.

No organization is likely to disagree with the statement, "We could get better at how we work together." However, the spread of the methods for enhancing teamwork and collaboration has been slow. When collaborative capital has been the focus, some remarkable companies have emerged as leaders in their industries. McDonald Douglas' Long Beach plant that manufactures giant military transport planes was on the verge of closing in 1992 because of customer complaints about poor quality when the members decided to take a radically different approach to organizing—a way based on collaboration. The plant won the Malcolm Baldridge award for quality 5 years later. The

work to enhance employee involvement and teamwork has continued since then and spread to the rest of the company (Boeing bought McDonald Douglas in 1997). Development of both organizational and collaborative capital saved that plant.

SUMMARY

All of the forms of capital depend on the expertise of the members in the organization—technical, social, and business skills and competencies—that enable high-quality decisions and high-quality work. New members bring some of that human capital with them and develop more through their years in the organization.

New models for reporting tangible and intangible assets have emerged in the past decade or 2 that include the intangible asset monitor (Sveiby, 1997), the balanced scorecard (Kaplan & Norton, 1992, 1996), the Skandia value scheme (Edvinsson, 1997; Edvinsson & Malone, 1997), and the intellectual capital accounts (Danish Agency for Trade and Industry [DATI] 1998). Each of these approaches attempts to include both categories of assets but is based on different assumptions and comes from different frameworks. The balanced scorecard is probably the most influential of these models. It is being adopted and adapted in a wide range of organizations and at both the company and business unit levels including categories for financial, human, customer, and structural capital.

As global competition heats up, it becomes imperative to find ways to develop the many forms of intangible capital. Making them visible via reporting mechanisms is a good first step in highlighting progress-developing capitals in key arenas. It also increases awareness of the impact of deficiencies through either voluntary or involuntary terminations.

The importance of making the intangible forms of capital visible is most readily seen when companies downsize. Firing employees reduces many of the forms of intangible capital for short-term gains in financial capital. When Nortel went through a series of layoffs after the recession of 2000, an article in the Wall Street Journal said the company had finished cutting fat and was not cutting muscle, meaning the loss of people was beginning to weaken the company in obvious ways. The loss of any member diminishes capacity in one way or another because each member has unique intellectual and social capital that walks out the door on the last day of employment. The greater the intellectual capital and social capital is of the person leaving the organization, the greater the loss is to the company. It may be more obvious with top-level employees where a change in executives or leading scientists causes a stock price to plunge, just as the addition of that kind of new person to the company causes its stock to rise. "In a world where a slight advantage easily turns into a leading position, think about the profits a company correctly utilizing all its assets might gain over a company that uses only 20% to 30% of its assets, that is only the financial ones" (J. Roos, G. Roos, Edvinsson, & Dragonetti, 1998, p. 14).

REFERENCES AND FURTHER READINGS

- Adler, P. S., & Kwon, S. (2002). Social capital: Prospects for a new concept. *Academy of Management Review*, 27(1), 17–40.
- Crainer, S. (2000, November/December). 1 + 1 = 11. Across the Board, 37(10), 29–34.
- Cohen, D., & Prusak, L. (2001). In good company: How social capital makes organizations work. Boston: Harvard Business School Press.
- Danish Agency for Trade and Industry. (1998). *Intellectual capital accounts: New tool for companies*. Copenhagen, Denmark: DTI Council. Retrieved September 16, 2007, from http://www.ll-a.fr/intangibles/denmark.htm
- Edvinsson, L. (1997). Developing intellectual capital at Skandia. *Long Rang Planning*, *30*(3), 366–373.
- Edvinsson, L., & Malone, M. S. (1997). *Intellectual capital: Realizing your company's true value by finding its hidden brainpower.* New York: Harper Collins.
- Ehin, C. (2000). *Unleashing intellectual capital*. Boston: Butterworth-Heinemann.
- Free dictionary. (2007). Retrieved September 16, 2007, from http://www.thefreedictionary.com/work+up
- Hafey, R. (2007). *Using "lean leadership" to improve the delivery process*. Retrieved September 16, 2007, from http://www.flexco.com/news_events/ppt/NIBA_ApplingLeantoAnyProcess2.ppt
- Kaplan, R. S., & Norton, D. P. (1992). The balanced scorecard: Measures that drive performance. *Harvard Business Review*, 70(1), 71–79.
- Kaplan, R. S., & Norton, D. P. (1996). Linking the balanced scorecard to strategy. *California Management Review*, 39(1), 53–79.
- Lawler E. E., & Mohrman, S. A. (2003). *Creating a strategic human resources organization: An assessment of trends and new directions.* Palo Alto, CA: Stanford University Press.
- Leana, C., & Van Buren, H. (1999). Organizational social capital and employment relations. *Academy of Management Review*, 24(3), 538–555.
- Lev, B. (2004). Sharpening the intangibles edge. *Harvard Business Review*, 82(6), 109–116.
- Merriam Webster's collegiate dictionary (11th ed.). (2007). Springfield, MA: Merriam-Webster.
- Quinn, J. B. (1996). Leveraging intellect. *Academy of Management Executive*, 10(3), 7–28.
- Roos, J., Roos, G., Edvinsson, L., & Dragonetti, N. C. (1998). *Intellectual capital: Navigating in the new business landscape*. New York: New York University Press.
- Sage, A. P. (2002, November 2). Information technology and civil engineering in the 21st century. *Information Technology, ASCE Talk,* p. 9. Retrieved September 16, 2007, from http://www.civil.gmu.edu/Misc%20Documents/IT-CE.pdf
- Stewart, T. A. (1997). *Intellectual capital: The new wealth of organizations*. London: Nicholas Brealey Publishing Limited.

410 • INFORMATION AND KNOWLEDGE WITH MOBILITY AND ETHICS

- Sveiby, K. E. (1997). *The new organisational wealth: Managing and measuring knowledge-based assets.* San Francisco: Berrett-Koehler.
- Tomer, J. F. (1987). Organizational capital: The path to higher productivity and well-being. New York: Praeger.
- Ulrich, D. (1998). Intellectual capital = competence X commitment. *Sloan Management Review*, 39(20), 15–26.
- Ward, A. (2007). Arian Ward's "definition" of intellectual capital and knowledge. Retrieved September 16, 2007, from http://www.co-i-l.com/coil/knowledge-garden/ic/arianic.shtml
- Womack, J. P. (1996). Lean thinking. In J. P. Womack & D. T. Jones (Eds.), *Lean thinking: Banish waste and create wealth in your corporation* (pp. 305–311). New York: Simon and Schuster.

WHAT IS THE BUSINESS CASE FOR ADOPTING RFID?

FRED RIGGINS

University of Minnesota

n most of today's modern companies, information technology (IT) forms the backbone on which information is circulated throughout and beyond the organization to inform employees, customers, trading partners, and other entities about the activities of the organization. For example, internal IT systems connect finance, marketing, manufacturing, human resources, and other parts of the firm through enterprise resource planning (ERP) systems that track orders and production output. Web-based Internet applications called extranets allow authorized external trading partners to enter protected parts of the organization's internal systems to view relevant production schedules. Customer relationship management (CRM) systems use data mining techniques that allow sales and marketing personnel to understand historical sales data and create more personalized experiences for customers. Powerful IT-based analytical and trading tools allow financial analysts to forecast stock trends and link directly into the market to engage in electronic trading.

Occasionally, a new technology emerges that can result in major improvements in the cost-performance capabilities of the firm's information systems (IS). Radio frequency identification (RFID) is a technology that has the potential to dramatically alter the ability of the organization to acquire data about the location and condition of any item that can be physically tagged and wirelessly scanned within certain technical limitations (Curtin, Kauffman, & Riggins, 2007). When this type of new technology comes along, it is important to have frameworks that allow managers to judge the potential business value of the technology, which can help

them build the business case for related investments. Further, these frameworks can help managers develop plans for organizational change that is often needed to take full advantage of the innovation. In this chapter, I provide an overview of RFID technology and suggest a framework to analyze the business case for adopting RFID. At the conclusion of this chapter, the reader should have a working knowledge of some of the components that make up an RFID system, as well as an understanding of the various ways this technology can add value to today's organization.

BACKGROUND AND RELEVANT TECHNICAL ISSUES

In 2005, MIT listed RFID as the 10th most innovative technology of the past 25 years ahead of hybrid cars, HDTV, the space shuttle, and nanotechnology. One reason why it is considered so innovative is that it can be used to track the location of items, monitor the surrounding environmental conditions, wirelessly communicate with strategically placed readers, and emit radio signals that can be used by other equipment to initiate changes to the object or its surroundings. Essentially, RFID has the potential to bring computer-based intelligence to any mobile item that can be tagged. For example, by tagging individual items held in a retailer's stock room, the system can act as if there were a unique manager assigned to watch over each item in inventory. If the stockperson begins to take an item to the showroom, a tag can notify the stockperson that a different item

should be taken due to its soon-to-expire expiration date. This type of micromanagement of individually tagged items can deliver efficiency benefits, make the organization more effective in its decision making, and bring strategic benefits over rivals when integrated with other systems.

Despite the recognition by MIT, RFID has actually been around for more than 25 years. An early version of this technology was used by the British during World War II to identify friendly aircraft. By placing powerful RFID tags on airplanes, these transponders could alert radar towers to their approach. As the technology improved over the next few decades, many firms began implementing antitheft systems to alert store management when an item was being shoplifted. During the 1970s, RFID technology was used to track cattle and other animals that could be tagged and then allowed to roam. In the last few years, society has seen considerable interest in this technology as large buyers have seen the potential for using RFID to track inventory through the supply chain.

Today, RFID technology is made up of three components (Information Technology Association of America [ITAA] 2004). The RFID tag is made of two items: A tiny silicon chip, perhaps a few millimeters in size or smaller, contains a limited amount of data and can receive and emit a radio signal through an attached antenna, which may be shaped in a maze-like pattern to increase the length of the antenna while keeping the size of the tag to one square inch in area or smaller. The emitted signal is read by a reader, which can be placed in many locations such as the warehouse receiving door or on a handheld scanning device. The reader is linked to other information systems, which process, store, or transfer the data to various applications.

Tag Types and Sizes

RFID tags come in a variety of sizes and shapes, which impact their cost, their read-range distances, the amount of data that they can store, and their ability to monitor more than simply location (Cooney, 2006; Finkenzeller, 2003). These all impact the usefulness of RFID for a given application. Clearly, it is important to match the technical capabilities of the tag with the business need and the physical and financial limitations of the proposed application. The cheapest tags are passive tags, which have no internal power source but, rather, draw power from the signal sent by the reader. The reader scans the surrounding area by continuously sending out a signal within a certain frequency range. When a passive tag comes within the read range of the signal, the passive tag is "awakened" and responds to the reader by transmitting an identifier code. For small, cheaper tags, this identification code may be the only data stored on the tag, but it is enough to alert the reader that it, and the item it is attached to, have passed within the read range of the reader. When read ranges are limited to a few feet, this is enough to allow the system to know that a certain tagged item has passed through the warehouse receiving door or has been shoplifted.

Active tags are larger, perhaps the size of a credit card or a cell phone, and include a battery source to power the tag, which can increase the read distance or power additional features of the tag such as an internal temperature or vibration monitor. The larger tag size also allows for more data storage capacity. In addition to storing an identifier code, these tags might log temperature readings every 5 minutes over the course of a weeklong truck haul, which can be downloaded after transport. In this way, the internal battery allows the tag to be active and engaged even when readers are not present. While more expensive and bulkier, active tags have more potential uses than passive tags, which are typically used simply to alert the system to its presence. Again, the type of tag that is right for a specific application depends on the functionality needs of the problem, size limitations, read distance requirements, and financial constraints.

Standards play an important role in maturing the technology and allowing different readers to communicate with different tags. RFID is an extension of existing barcode technology and is integrated with the EPCglobal Network. The EPCglobal Network was developed by the Auto-ID Center at MIT and is a joint venture between EAN International and the Uniform Code Council to develop, support, and promote the global adoption of the standardized Electronic Product Code (EPC) and RFID.

One question that often comes up is "why do we need RFID when we have barcodes?" Several advantages of RFID over barcodes include

- no need for line of sight scanning, which typically requires manual intervention to line up the barcode with the scanner;
- even if items could have their barcodes scanned while on a conveyor belt, they still need to be individually positioned; yet with RFID, items can be scanned while still packed deep within a pallet;
- RFID can better handle off-track items and can be used to find misplaced items in a warehouse;
- with RFID you can scan many items at once, whereas barcodes require items to be scanned one by one;
- barcodes identify the type of product, whereas the EPC code identifies a specific tag and therefore a unique item, not just item type; and
- RFID allows for dynamic data interchange with the system, while barcodes are simply identifiers.

So while barcodes will continue to be used for certain applications, RFID provides more powerful capabilities.

As I stated, RFID has been around for years, however, the adoption of the technology took a major step forward when Wal-Mart announced in 2003 that it expected suppliers to begin using RFID tags on shipped items at the pallet level by January 2005. To make it economical for both Wal-Mart and their suppliers, this type of tagging is done using small, disposable, EPCglobal-based, standardized passive tags. Other major buyers soon followed Wal-Mart by requiring suppliers to implement RFID including the

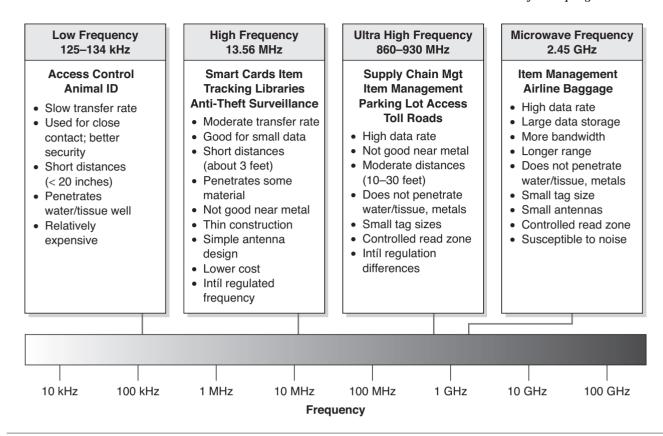


Figure 90.1 Four Frequencies for RFID Applications

U.S. Department of Defense and Target (Bacheldor, 2004). With these mandates leading to widespread incorporation of passive tags on products or pallets, it is expected that the tag cost when purchased in bulk (per million) will soon drop to about \$0.05 per tag. This illustrates the importance of having the backing of a large promoter of the technology, which forces adoption on a large scale. This results in a drop in the price of technology components that can be procured in bulk. Without the prospect of achieving the \$0.05 per tag price, most suppliers would find adoption of this technology daunting and infeasible.

Frequencies and Read Ranges

In addition to the size and battery source, another important characteristic of RFID tags is the frequency at which they transmit their signal. Again, standards play an important role since tags and readers must be tuned to transmit and receive certain signal frequencies. Further, radio frequencies have many purposes and are closely regulated by governments, who allow specific frequency bands to be made available for certain purposes. One problem that may arise in promoting RFID usage across global supply chains is that different governments have not necessarily allocated the same frequency ranges for the same purposes. Therefore, international cooperation is critical if RFID is to be universally accepted. The frequency used not only determines the feasible distance of reading the signal, but it

is also a fact of physics that certain frequencies are better at penetrating certain items such as metal, water, or skin.

There are essentially four frequencies used for different applications of RFID (see Figure 90.1). Low frequency (LF; 125–134 kHz) is used for tagging pets because it is good at passing through water and skin, but it requires a very close read range such as passing a handheld device over the pet. High frequency (HF; internationally accepted 13.56 MHz) ranges have a higher read distance and a faster data transfer. They are commonly used in retail theft-prevention applications for high-value goods, for smart cards, and for tagging books in libraries. Because they have a better read distance, HF tags can be used to find items like lost books in libraries. The tags being used in supply chain management applications as promoted by Wal-Mart and others are typically in the ultrahigh frequency (UHF; 860-930 MHz) range and are useful because of a longer read distance and the low cost of producing many tags. Also, because of a faster data transfer rate a vehicle carrying many tagged items can pass through a dock door at a reasonable speed and still achieve high read rates. Here, one sees differences in international standards: Most American applications run at 915 MHz, while Europe has developed similar applications at 868 MHz. Finally, some applications that require longer read distances and large data files may use microwave frequencies (2.45 GHz).

Depending on the size of the tag and the frequency used, the current range of reception of the reader is limited. Tags operating at 13.56 MHz have a maximum range between the tag and reader of about one meter. Some tests using the 915 MHz frequency have a range of up to 60 feet under ideal conditions. In general, tags operating at LFs (around 125 kHz) use much less power, have a limited read range, but are able to penetrate most nonmetallic substances including liquid. Tags at UHFs (860–930 MHz) use more power and are less likely to pass through certain materials.

As can be seen in Figure 90.1, depending upon the frequency used, many physical limitations can hamper the reading of the tag such as metal, water, interference from other radio signals, and so forth. It is easy for people who do not understand the technology to have fears of how their privacy may be invaded in an RFID-saturated world. However, given the limited read distances and the other factors impacting reader capabilities, it is unlikely that vans will be patrolling the streets with readers monitoring what we have inside our homes. Nevertheless, there are certain areas where security is important, and precautions by systems developers need to be considered. Having RFID tags embedded in passports, in shipping containers, in tags that contain personal medical information, or in employee badges call for particular attention to security and privacy issues. Without proper consideration of both the real and perceived potential violations of individuals' privacy, adoption of RFID may be resisted by many individuals.

EPCglobal

As stated earlier, the cooperation of different groups and governments to create standards is critical for the seamless integration of RFID across multiple settings found in business-to-business applications, security issues related to international trade, and tracking the location history of items as they move through the supply chain (Asif & Mandviwalla, 2005). EPCglobal has played a critical role in developing these standards. EPCglobal was formed in 2003 and is a successor to the early work done on RFID standards by the MIT Auto-ID Center. Today, EPCglobal works toward global adoption and standardization of RFID using the EPC specification for identifying specific product items. Further, they seek ways to integrate the Internet with RFID to create the EPCglobal Network. The main feature of the EPCglobal Network is the EPC Information Services (EPCIS) information repository available to users of RFID technology. The EPCIS keeps track of various RFID events in the history of a given tagged item. Because the EPC identifies each unique tagged item, it is possible to track and record an historical record of where the item was at a specific point in time, the circumstances surrounding that item, and who was responsible for it at that time.

Another component of the EPCglobal Network is the Object Naming Service (ONS). The ONS is based on the domain name system (DNS), which keeps track of the virtual address of each Web site domain name. As the EPCIS historical record is maintained and updated regarding the

history of an EPC-tagged item, the ONS will provide a way to allow users to log on to the Internet and use the ONS to view the historical record of the location and conditions of a item at any point in time. While there are many obstacles to implementing this type of service in practice, the concept and standards are widely agreed on, and we should expect to see applications using this type of service by the end of the decade.

The usefulness of this type of network can be seen when we consider the problems associated with events like an E. coli outbreak due to contaminated food. Using RFID, related monitoring technology, and a fully developed EPCIS, it would be possible to track the historical location record of certain food products, the environmental conditions surrounding them during transport and storage, and what other items were nearby at any point in time that could have also been contaminated. Similar systems could be used to track the location of patients in a hospital to understand the potential impact of the spread of communicable diseases. Also, an EPCIS could be used to track the history of a pharmaceutical drug to authenticate its origin and where it might have been counterfeited or tampered with at any point along the supply chain.

THE VALUE PROPOSITION ALONG THE VALUE CHAIN

Our framework for identifying where value is generated using RFID is based on two components. First, I will examine different applications across the value chain. Specifically, RFID can be used to support activities within five different structural settings: inbound logistics, internal operations, outbound logistics, sales and marketing, and after-sale service. Each of these represents opportunities for using this technology to track the location and monitor the conditions of tagged items. Figure 90.2 provides a useful way of thinking about the different items that can be tagged including vehicles, equipment, items, and people. The figure also outlines several obstacles to achieving value from the technology. Many of these obstacles relate to managerial concerns, organizational barriers, technical limitations, economic feasibility, and legal restrictions.

Inbound Logistics

RFID can be used to monitor the location and condition of parts and finished goods while being shipped to the organization's facilities. Having visibility into the current location and status of the shipment allows for accurate inventory management through inventory anticipation. In addition, using monitoring technology along with basic RFID technology allows the recipient to monitor the condition of items while in transit. Monitoring vibration can help predict breakage and other quality control problems. Tracking temperature, humidity, light, or air pressure during shipment

Structural Setting within the Value Chain	Inbound Logistics	Internal Operations	Outbound Logistics	Sales and Marketing	After-sale Service
Task Related Tagable Entities Equipment Parts Products Packaging People	Transport vehicles Interface vehicles Vehicle operators Individual items Bundled items Item handlers Cargo containers	Transport vehicles Vehicle operators Individual items Bundled items Item handlers Mobile equipment Machine parts Documentation	Transport vehicles Interface vehicles Vehicle operators Individual items Bundled items Item handlers Cargo containers	Transport vehicles Individual items In-store demos Sales personnel Customers Item handlers Promotion items	Transport vehicles Individual items Service personnel Service equipment Customers
Obstacles to Value Managerial Organizational Technical Economic Legal	Trading partner compliance Governance and ownership Cost/distance tradeoff RF-unfriendly packaging Pallet transparency Off-track items Standards inconsistencies Labor privacy	Application integration Cost/distance tradeoff RF-unfriendly packaging Reader costs Reader interference Pallet transparency Off-track items Dependency risks Labor privacy	Trading partner compliance Governance and ownership Cost/distance tradeoff RF-unfriendly packaging Pallet transparency Off-track items Standards inconsistencies Labor privacy	Cost/distance tradeoff RF-unfriendly packaging Reader costs Reader interference Labor privacy Customer privacy Customer sabotage Mishandled promotional items Data flood	Cost/distance tradeoff Retrofitting equipment Labor privacy Customer privacy User alterations De(activation) Data flood

Figure 90.2 Tagable Entities Along the Value Chain

can be important for certain perishable items such as food or pharmaceuticals. Just as delivery time status can impact the organization's inventory control systems, being able to predict the condition of items when they arrive can be useful for determining appropriate routing and reorder decisions. Finally, RFID coupled with sophisticated monitoring technologies can allow the recipient of the shipment to control processes remotely during shipment. For example, when monitoring temperature in the truck, the recipient can request changes in the truck temperature or request the shipment be diverted to a closer facility rather than risk spoilage over a long truck haul over the desert.

Internal Operations

Just as monitoring the location and condition of items during inbound transit directly impacts the organization's inventory management system, monitoring the location and condition of items within the firm's internal operations facilities impact these systems. Another area of impact is through asset management of expensive pieces of equipment, which may easily be misplaced, lost, or hoarded by employees. Hospitals, manufacturing facilities, and computer support teams can all benefit by knowing the exact location of expensive mobile equipment that needs to be

at a specific location at a specific time for a specific task. This is particularly beneficial when the equipment is used by high-paid employees who otherwise may need to wait or search for the item. Finally, tracking the location of employees themselves may be beneficial to the organization for planning workflow, work assignments, and other types of employee monitoring needs. This type of monitoring must be balanced with a respect for personal privacy. RFID is just one type of monitoring technology that will make this a more delicate issue in human resource management in the coming decade.

Outbound Logistics

Just as monitoring the location and condition of items during inbound transit adds value to the firm, monitoring finished goods during outbound logistics provides an important service to customers. Being able to reroute outbound shipments as conditions change or respond to customer queries about the location and condition of items may allow the firm to gain a competitive advantage over rivals. Also, linking this tracking system with internal systems may allow the firm to carry less inventory and still be able to support a customer's just-in-time manufacturing environment.

Marketing and Sales

In a sales floor environment, RFID systems integrated with internal operational systems can be used to reduce out-of-stock situations thereby providing the customer a better shopping experience. Similarly, there are many situations where a customer service associate needs to locate a specific item related to the customer's visit such as a physical medical record, a book in the library, or an item stored in the backroom. By equipping the associate with handheld RFID scanners, they can quickly locate the item leading to better customer service. Smart shelves can detect when an item is not on display or has been inadvertently moved to a different location by a customer. Smart shelves can also detect when a prospective customer browses through a brochure or some other physical promotional item, which could cause a customized video to be displayed. Finally, just as tagging employees can add benefits, encouraging customers to carry RFID-enabled promotion cards can make for a highly personalized store visit. Again, personal privacy must be ensured in such situations.

After-Sales Service

Finally, tagging items that require occasional servicing may allow the maintenance personnel to quickly download repair procedures for that specific model, retrieve usage history, or help diagnose problems or retrieve suggested courses of action quickly. In the extreme case, tagged items may potentially be serviced remotely without the presence of an actual maintenance person.

THREE TYPES OF INVESTMENT JUSTIFICATION

Besides the structural setting along the value chain, there are typically three ways to think about justifying IT investments: efficiency benefits, effectiveness benefits, and strategic benefits. Improving efficiency by doing things better, faster, and cheaper has traditionally been the primary use of IT. Doing things faster with less human intervention creates a leaner, more responsive value chain and can allow the efficient organization to squeeze out inefficient competitors, which typically adds value to the end customer. IT can improve the effectiveness of decision makers by getting them the right information at the right time and in the right format. By integrating intelligent systems with RFID technology, decision makers can have real-time visibility into the location and condition of tagged items. When combined with data analytic tools, powerful decision support tools and expert systems can be implemented. Finally, when fully integrated with other systems, RFID can produce strategic benefits for firms by giving them a competitive advantage in their marketplace. This type of application typically involves working more closely with trading partners and/or locking-in users to new products and services enabled by

the technology. I now look more closely at how RFID can be used to generate these three types of benefit.

Efficiency Benefits

Many processes can be done more quickly using RFID thereby creating efficiency benefits. When various items such as equipment, people, or materials are being routed through a process, their presence and/or condition can be automatically detected and logged into the system. Otherwise, they would need to be manually scanned, inspected, and logged one by one. This is a considerable time and labor savings. Further, by knowing the location and/or condition of these items, the system can predetermine optimal routing such that they can be directed to the appropriate place. Also, by using RFID systems to monitor the location and conditions of these items, the system or authorized personnel can reroute them to adjust to changing needs at various locations. Further, by monitoring the condition and environmental status of items, the system can remotely request changes in the environmental conditions around these them. This type of location and condition monitoring allows the organization to bypass employees and other intermediaries by automating the process. On the other hand, by owning the data associated with the location and/or condition of various items within the supply chain, the organization may emerge as a new intermediary that is able to collect RFIDgenerated data, analyze it, and offer it to interested parties. In some cases, owners of RFID-generated data may be able to understand a multiparty value chain process better than any one member of the value chain.

The real-time data gathering capabilities of RFID generates efficiency benefits by creating new forms of interaction that were previously not possible. When integrated into existing systems, a new form of automated two-way dialog can be created that can result in considerable efficiency benefits as interacting systems trigger process actions, generate real-time data updates, and monitor potential problem scenarios more efficiently than humans. In addition, this real-time data can be used to update marketing campaigns on the fly or change inventory plans on a moment's notice. One of the most powerful ways to use IT is to use software agents to automate a series of time consuming or otherwise infeasible tasks. Software agents are intelligent applications that are able to learn from their environment and improve their performance based on data collected over time. RFIDenhanced agents that are able to monitor remotely the location and condition of mobile items have unique eyes and ears into the tagged item's surroundings that improve their ability to learn. In this way, RFID can provide considerable efficiency benefits when integrated into intelligent agents.

Effectiveness Benefits

RFID can generate effectiveness benefits by making data and information available to decision makers in a more timely fashion. With RFID, the system is able to reflect exact current inventory levels and status conditions since systems are constantly updated to reflect the movement of items into, within, and out of the facility. By knowing the exact location and condition of items, the system can better forecast future inventory levels and conditions. By receiving real-time remote telemetry about the location and condition of various items, RFID systems can aid the effectiveness of decision makers over long distances. These systems allow managers to essentially be in multiple places at a given time by giving them eyes and ears into distant processes and locations. Further, by monitoring the location and condition of items, the system can automatically forecast future problem scenarios and can be authorized to make decisions to take into account the anticipated future location and condition of items.

RFID allows organizations to be more effective at creating a personalized service to users of the system, other internal employees, or external constituents. When the system knows the exact location and condition of various items being tracked and monitored, it is possible to provide a more personalized interface to users, present current information to decision makers, alter the work environment of employees based on who is present at the time, and provide a more unique experience to external entities. In addition to personalizing to users, RFID systems that can monitor the location and condition of mobile items, as well as the conditions of the environment surrounding them, are able to respond with intelligence to the environment itself to alter it, respond to queries, notify managers of problem areas, or make routine decisions automatically. This capability is based on predefined decision criteria as specified by management. Finally, another form of personalization occurs when decision makers use decision support systems that respond to inputs to create a unique decision output based on the decision maker's current situation. RFID can be used to make decision support tools reflect the current location and condition of any mobile, tagged entity. These RFIDenhanced decision support tools can help users be more effective in decision making. In addition, RFID data can enable the creation of new decision support tools that were not feasible prior to RFID. In some cases, these new decision support tools can be made available to outside users, perhaps as a revenue-generating business opportunity.

Strategic Benefits

When RFID data is integrated into other systems within and outside the organization, the system can provide strategic benefits by creating a seamless flow and thus real-time availability of items across a virtual enterprise. This allows authorized users to know the location and condition of items at all times and to ensure their availability 24/7. When this capability is integrated across the enterprise and outside the enterprise to include other consortium partners, competitive advantage can be achieved relative to other organizations or consortia that do not have such seamless integration. One way this is done is to use RFID to know the current exact lo-

cation and conditions of equipment, people, and other items, which allows the system to reroute these items to balance the availability of the right number of items within a globally distributed value chain. By doing so, an organization can achieve strategic benefits by extending its physical reach and locate new facilities to further locations that otherwise may not have been feasible. Virtual integration occurs when multiple parties along the value chain integrate their systems to the extent that they are able to act as if they are one entity. This type of consortium is able to achieve many of the benefits of physical integration without the difficulties of getting too large or engaging in an actual merger. RFID monitoring capabilities enhance the ability of organizations to integrate virtually by providing real-time data transfer across organizational boundaries of information associated with mobile items at any facility. By increasing the monitoring capabilities across organizational boundaries, considerable process benefits can be achieved by the consortium resulting in strategic advantage relative to competing consortia.

When RFID-generated information is valuable to users of the system, other employees, or external parties, these people typically will alter their patterns of behavior to make use of that information. When this happens, the system becomes indispensable in their job and they become lockedin to using the system. This may be a significant source of competitive advantage, particularly when the entity being locked-in is an external customer. The potential to generate benefits from RFID is enhanced when coupled with process redesign by both providers and users of the system. When this type of technology is coupled with process redesign, both parties are able to gain advantage and the implementer of RFID can achieve advantage over rivals who do not engage in such redesign. RFID systems allow organizations to gather large volumes of data that may be unique to the value chain or marketplace. When combined with sophisticated data analytic capabilities, these systems can generate unique information that may be used to create new products or services that were not previously possible. By offering this proprietary systemic competency into the marketplace, an organization may generate new revenues or enhance their competitive position within the industry.

AN INTEGRATED FRAMEWORK FOR BUILDING THE BUSINESS CASE

By combining the 5 structural settings along the value chain and the 3 ways of justifying IT investments, I can identify 15 different ways RFID can add value as shown in Figure 90.3. By thinking about the value proposition at this level of detail, a manager can ask the following questions when developing the business case for RFID:

 How can RFID be used to track the location and monitor the condition of items during inbound logistics to achieve efficiency benefits, effectiveness benefits, and strategic benefits?

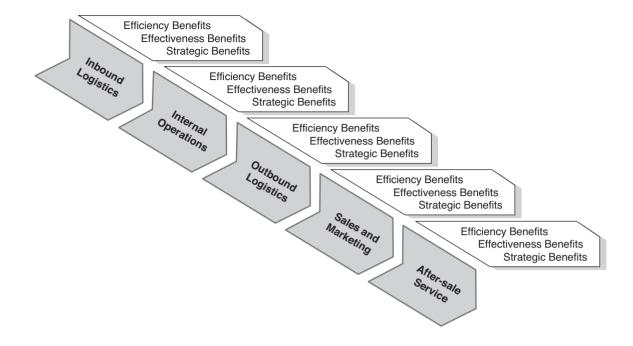


Figure 90.3 The Value Proposition Along the Value Chain

- How can RFID be used to track the location and monitor the condition of items within internal operations to achieve efficiency benefits, effectiveness benefits, and strategic benefits?
- How can RFID be used to track the location and monitor the condition of items during outbound logistics to achieve efficiency benefits, effectiveness benefits, and strategic benefits?
- How can RFID be used to track the location and monitor the condition of items for marketing and sales to achieve efficiency benefits, effectiveness benefits, and strategic benefits?
- How can RFID be used to track the location and monitor the condition of items for after-sales service to achieve efficiency benefits, effectiveness benefits, and strategic benefits?

I will now use this integrative framework to examine the business case for adopting RFID in four different settings: a third-party logistics provider, a consumer goods retailer, a hospital setting, and an airline.

Case Example 1: Customer Service by a Third-Party Logistics Provider

Due to the complexities of many supply chains, intermediaries called third-party logistics providers (3PLs) often are contracted to be responsible for arranging shipment of goods from manufacturers to a retailer's warehouse facilities. These 3PLs act as outsourcing agents by working

closely with customers and their suppliers to manage a large number of trucking or rail carriers. These 3PLs add value as intermediaries in part due to the highly fragmented and independent nature of the trucking industry. In many cases, the 3PL does not actually take possession of any goods, but monitors the performance of the trucking companies to ensure their customers—for example, a large retailer—are satisfied. Using our framework, we see that 3PLs are mostly concerned with activities associated with inbound and outbound logistics.

Consider a situation where a large grocer needs to receive a shipment of fresh fruit from growers in California to warehouse facilities in the Northwest. The 3PL would be hired to be responsible to arrange shipment and guarantee a certain level of quality and freshness of the product. To do this, the 3PL would contract with a long-distance truck hauler to make multiple stops in California, haul the load of various produce items, and then unload the goods at the grocer's warehouse facility. Clearly, there are several ways value can be added using RFID in this situation. By tagging pallets of produce at the grower's site, the 3PL and the retailer can have visibility as to where the pallets are stored, when they are loaded onto the truck, when they are unloaded at the warehouse, and where they are stored in the warehouse. This creates significant efficiency benefits for the grocer who is able to streamline its inventory system by knowing exactly where each pallet in the shipment is and when it can be expected to arrive. Further, effectiveness benefits are realized by being able to know in real-time where the shipment is, which contributes to more effective inventory planning. Finally, to the extent to which the grocer becomes dependent upon this service, they may become locked-in to this 3PL, particularly if other competing 3PLs are not able to offer the service or are not able to make good use of the analyzed data. In an extreme case, the 3PL would be able to use this data over time to understand nuances of the supply chain that the grower, shipper, nor grocer understands.

Now consider the impact of combining RFID with temperature monitoring technology in the truck. Not only would the 3PL know the location of each pallet, but they could also know the condition of the produce by closely monitoring environmental conditions. For example, the 3PL could analyze this data to better understand temperature variations within the truck vertically and horizontally, and then instruct the trucker how to load the different types of produce on the truck (which would presumably have different tolerances for temperature variations). The 3PL could more closely monitor the performance of the trucker, the impact of opening and closing the truck doors, the impact on outside temperature variations, and the extent to which the driver is able to maintain a consistent environmental condition in the truck. The grocer would receive effectiveness benefits by being able to better route different items to the display floor. For example, due to the inevitable temperature variations in the truck, armed with this detail of historical data, the grocer could determine which packages from which pallets need to be sold first to optimize the overall freshness of the entire shipment. Ultimately, by integrating this technology seamlessly across the systems of the grower, the trucker, and the retailer, the 3PL can achieve strategic benefits by making the entire supply chain perform better relative to what the retailer could achieve through a competing 3PL.

Case Example 2: Applications by a Consumer Goods Retailer

The previous example illustrates some of the benefits a retailer can receive by integrating RFID into its inbound logistics operations as well as its internal operation by linking the warehouse to the specific stores. One of the biggest problems facing consumer goods retailers is the out-of-stock problem. For most retailing situations, it has been estimated that about 1 of 12 items is out at a given time. That means that 1 of 12 customers will either switch to a different item (meaning the customer is dissatisfied), switch to a different brand (meaning the manufacturer is dissatisfied), or not buy at all (meaning all parties are dissatisfied). In some cases, the item may be on the shelf but may have been browsed and misplaced by an earlier customer. In other situations, the item may be in the backroom, but not yet stocked, or may be misplaced in the backroom. Out-of-stocks can be a particularly large problem for manufacturers hoping to capitalize on an existing advertising campaign that may attract customers, who then cannot find the item on the shelf. RFID has been shown to lessen the out-of-stock problem for retailers that implement the technology and thereby gain better visibility into the location and condition of tagged entities (see Hardgrave, Waller, & Miller, 2005; Ton, Dessain, & Stachowiak-Joulain, 2005).

Now consider some benefits that can be obtained for a retailer's sales and marketing efforts. The opportunities to use RFID technology combined with personalization technology for business-to-consumer marketing is both compelling and problematic (Fusaro, 2004). Retailers that offer preferred customer cards may be tempted to tag the cards so that customers can be identified when the customer enters the store. Being able to track that a customer spends 10 minutes in aisle six before moving on to spend 15 minutes in aisle four raises marketing opportunities as well as privacy concerns. Further, by tagging promotional materials, readers can note that a particular customer removed a specific product flyer from the rack and can activate follow-up marketing at a later time. Efficiency benefits can be obtained by making it easier for customers to find items in the physical store, lessen the need for sales people in the store when the system can provide customers directions, and better optimize the layout of the store to speed customer traffic into and out of the store. In-store RFID-based marketing activities of this type are sure to result in a flood of data that will require marketers to employ powerful data mining capabilities. When they do so, they will be more effective at providing a highly personalized shopping experience, make sure items are always stocked based on forecasted demand, and improve decision making regarding product ordering and new product development based on customer tastes. Finally, strategic advantage may be gained if the customer comes to rely on this highly personalized service and becomes locked-in to the service provided by the RFID-enabled retailer.

Case Example 3: Asset and Patient Management by a Health Care Provider

Hospitals are currently implementing RFID technology to keep track of expensive medical equipment to be sure the item is in the right place at the right time. This type of asset management results in considerable value for the internal operations of the health care facility. Because of the expense of the equipment and the fact that a tag will remain on the item for essentially the life of the equipment, this type of application is much better suited for more expensive, and more powerful, active tags. Because this equipment is typically used by highly paid professionals and may be needed for life and death situations, it is critical that the equipment is available when needed. Significant efficiency benefits can be realized by having the system know the location of the equipment and allowing the RFID system to interface with procedure and equipment scheduling programs. In addition to time-savings, by being able to track the location of these expensive items the hospital will need fewer pieces of equipment and thus avoid the expense of carrying excessive equipment inventory.

Hospitals are also finding useful applications for tracking patients. For many years, hospitals have been realizing efficiency benefits by attaching barcodes to the medical ID bracelets worn by patients. In addition to the benefits noted earlier of RFID over barcodes, tagging patients with RFID can be useful for tracking unauthorized movement of patients such as Alzheimer patients who may inadvertently wander out of the medical floor or perhaps even attempt to leave the hospital facility. Similar applications can be used in tracking newborn babies or other patients that require close location monitoring. For the most part, these are efficiency benefits. However, more effective planning for medical procedures can be done when the system tracks the movement of patients throughout the facility.

Just as efficiency benefits can be realized by tagging patients, so too by tagging employees. For example, physicians move in and out of many rooms during a typical day at the hospital. In many instances, the physician is required to log into the system with each new patient room visit. By tagging the physician's name badge and having the system automatically log the physician in when entering the room, considerable efficiency benefits can be realized.

Health care facilities and workers also face the regrettable situation of facing lawsuits due to mismanaged drug administration. Consider the benefits that can be realized if the RFID-enabled system sensed that an individually tagged drug dosage, currently residing in a health care professionals coat pocket, entered a room that housed a patient for which that dosage was not intended. The system could alert the professionals of various drug interactions or other detrimental effects of mistaken drug management.

Finally, a related application of RFID is being pursued by pharmaceutical companies that seek to tag and track packaged drugs to avoid drug counterfeiting that can cost these companies millions of dollars. Other resulting benefits of tagging pharmaceuticals include providing blind patients with devices that sense a nearby pill bottle and audibly speak to the patient about the contents of the container.

Case Example 4: Luggage and Customer Tracking by an Airline

Another business sector that can readily benefit from RFID tracking is the airline industry. When airlines consider customers as valuable entities that enter and eventually leave the airline system, we can see that all five structural settings of the value chain can be impacted by RFID. For example, several airlines have begun testing the potential for tracking customer baggage by including an RFID tag on each checked bag. Delta Airlines believes there are significant efficiency benefits to be realized since the airline currently spends tens of millions of dollars locating 800,000 misdirected bags each year. Overall, Delta handles 70 million pieces of luggage each year (Brewin, 2004). Here, RFID can have efficiency impacts on the baggage check-in process (inbound logistics), movement of bags and customers throughout the airline system (internal operations),

the baggage claim process (outbound logistics), and home delivery of misplaced bags (after-sales service). Airlines that are able to use this technology effectively can achieve customer service benefits that may lock-in customers to that airline thereby creating strategic benefits.

Most airlines have also moved to e-tickets or ticketless processes. However, imagine the value of having flyers carry RFID-tagged tickets. Airlines can know the location of customers as they move through security checkpoints or through the airport between connecting flights. This would result in significant efficiency benefits as well as a much more personalized and, therefore, effective customer experience. Airports that compete for hub traffic may be able to gain competitive advantage over airports in rival cities as airlines choose to route their traffic through RFID-equipped smart airports.

IMPROVING THE USEFULNESS OF RFID

In this chapter, I have provided an overview of RFID, the components of an RFID system, and the relevant technical factors that drive construction of an RFID system for a particular application. Further, I have highlighted how RFID can deliver three types of value within five structural settings along the value chain and have provided four examples of how RFID is used in commercial settings today. It should be clear that this technology has considerable potential for impacting the organization at various points across, and beyond, the enterprise. However, realizing its full potential will be difficult and require considerable investments. In concluding this chapter, I offer four areas where management needs to be diligent if value is to be realized to its fullest extent (see also Clarke, Tazelaar, Twede, & Boyer, 2006).

First, research on related technologies such as electronic data interchange (EDI) has shown that investment in the technology coupled with business process redesign is the best way to maximize investment dollars. Specifically, investment in new technologies is an opportunity to examine how processes should be redesigned to take advantage of the technology capabilities. New technologies may automate tasks resulting in efficiency benefits, empowering decision makers with decision support tools for effectiveness benefits, and create closer electronic trading partner relationships with alliance partners to generate strategic benefits. However, all are best realized when processes are redesigned to take advantage of the new technology.

In particular, strategic benefits are best realized when new technology results in closer trading partner cooperation. Also, because RFID is often used as a way to connect trading partners, gaining efficiency and effectiveness benefits often requires certain actions on the part of the trading partner. For example, many benefits occur when one's trading partners integrate the RFID system back into their existing internal systems. This requires considerable trust and cooperation within the trading partner alliance.

The third recommendation is that organizations seek to integrate RFID systems into their existing systems. To comply with trading partner mandates for adoption, many organizations are adopting RFID as minimal "slap and ship" systems. However, firms that adopt this technology at such a rudimentary level leave many potential benefits on the table and will likely have trouble justifying such investments on simple return on investment calculations.

Finally, RFID will result in a massive new influx of data into the organization as readers monitor the movement of many items and multiple physical locations on a continuous basis. To make full use of this data, new data analysis tools will need to be employed to mine that data to understand fully the implications of how processes need to be changed, how customers can better be served, and how the data can be used to create new information-based products for customers.

Firms that follow these guidelines and seek to uncover different types of value at multiple points along the value chain are the ones that will most benefit from this new technology. These firms will be the ones that will lead the value creation effort in the emerging new world of ubiquitous computing.

REFERENCES AND FURTHER READINGS

- ALX Technologies. (2006). *RFID Update—The RFID Industry Daily*. Retrieved September 2, 2007, from http://www.rfidupdate.com/
- Asif, F., & Mandviwalla, M. (2005). Integrating the supply chain with RFID: A technical and business analysis. *Communications of the Association for Information Systems*, 15(24), 393–426.
- Bacheldor, B. (2004). Target pushes RFID adoption. *Information-Week*, 978, 18.
- Brewin, B. (2004, April 1). Delta begins second RFID bag tag test. *Computerworld*. Retrieved September 2, 2007, from http://www.computerworld.com/newsletter/0,4902,91826,00.html

- Cooney, E. M. (2006). *RFID+: The complete review of radio frequency identification*. Clifton Park, NY: Thomson Delmar Learning.
- Clarke, R. H., Tazelaar, J., Twede, D., & Boyer, K. K. (2006). Four steps to making RFID work for you. *Harvard Business Review*, 1–4.
- Curtin, J., Kauffman, R. J., & Riggins, F. J. (2007). Making the "MOST" out of RFID technology: A research agenda for the study of the adoption, usage and impact of RFID. *Information Technology and Management*, 8(2), 87–110.
- EPCglobal. (n.d.). *EPCglobal*. Retrieved September 2, 2007, from http://www.epcglobalinc.org/home
- Finkenzeller, K. (2003). *RFID handbook: Fundamentals and applications in contactless smart cards and identification* (2nd ed.). Hoboken, NJ: John Wiley and Sons.
- Fusaro, R. A. (2004). None of our business? *Harvard Business Review*, 82(12), 33–44.
- Hardgrave, B. C., Waller, M., & Miller, R. (2005, November). Does RFID reduce out of stocks? A preliminary analysis. Report from the Information Technology Research Institute, Sam M. Walton College of Business, University of Arkansas. Retrieved September 2, 2007, from http://itri.uark.edu/research/display.asp?article=ITRI-WP058-1105
- Information Technology Association of America. (2004, June). *Radio frequency identification: RFID . . . coming of age.* Arlington, VA: Author. Retrieved September 2, 2007, from www.itaa.org/rfid/docs/rfid.pdf
- RFID Journal. (2007). RFID Journal—RFID (Radio Frequency Identification) Technology News & Features. Retrieved September 2, 2007, from http://www.rfidjournal.com/
- RFID News. (2007, August 31). *RFID News: Technology, Tags, EPC, Wal-Mart, Readers, and Applications*. Retrieved September 2, 2007, from http://www.rfidnews.org/.
- RFID Research Center. (2007). RFID Research Center [Home page]. Retrieved September 2, 2007, from http://itri.uark.edu/rfid/
- Strategic RFID Solutions. (2007). Strategic RFID Solutions home page. Retrieved September 2, 2007, from http://www.strategicrfidsolutions.com/
- Ton, Z., Dessain, V., & Stachowiak-Joulain, M. (2007). *RFID at the METRO Group*. (Case, rev. ed. No. 9-606-053). Boston: Harvard Business School Publishing.

PART XIV

Organization Development and Change in the 21st Century

Change Agency in 21st-Century Organizational Life

R. MICHAEL BOKENO

Murray State University

ost academic disciplines are marked by their employment of essential concepts; that is, the way that their own theories, ideas, and constructs are used to capture or provide knowledge about particular phenomena. While there is some debate about the issue, it seems at least viable that *change* has become one of those essential concepts for the field of organizational development (e.g., Caldwell, 2005b).

Indeed, if there were a concept that would rival any other in the past 2 decades of discourse about organizational dynamics, it would be change. So pressing the perceived need, and so acute the perceived circumstances, that just a few years ago the periodical *Fast Company* featured the headline "Change or Die!" on the cover.

For the most part, the headline is true. Change has become an integral part of organizational life for both organizational members and organizations. Increasingly powerful technology plays some of a role in this: Technology advances now almost as fast as it processes information, so the ability to process more information faster requires new, innovative ways of managing information for better decisions. These new innovative ways of managing, in turn, set up an internal organizational dynamic of constant change. It is common—even trite by now—to hear members of all types of organizations talk about a current change initiative as the flavor of the month. While workers (and managers) may be a bit jaded by all of the change and all of the talk about change, it does make the process of change agency in the 21st century a rather complex phenomenon.

Change agency refers to how change is actually accomplished in organizational life. For every organizational change, some mechanism or entity has instigated it or is responsible for the guidance, implementation, or maintenance of the change. This mechanism or entity—usually a human being—is called a change agent. The activity of this mechanism or entity is called change agency.

In this chapter, I sketch a picture of change agency in 21st-century organizational life. My broad purpose is twofold: (a) to provide a more or less comprehensive understanding of the nature and functions of change agency in organizations—the nature and function of agency changes, certainly, according to organizational structure, culture, and the type of the change initiated; and (b) to offer some potential avenues of agency for readers inclined to take up the actual work of organizational change. While much of the change work is conceived and initiated in the context of organizational development (OD) by OD professionals, much of it also could and should be undertaken by professionals in other organizational roles.

Specifically and by way of preview, in this chapter, I (a) define change and agency; (b) provide a brief history of change agency in organizational life; (c) illustrate/schematize the nature, scope, and function of change agency in terms of the "political" intent and direction of the change; and (d) characterize the role of six different possibilities of change agent.

ORGANIZATIONAL CHANGE AND AGENCY

As implied from the introductory discussion, there can be little if any productive discussion of change agency without

an understanding of the nature of organizational change itself. Change and agency are therefore reciprocally defined.

Organizational Change

Perhaps the most discussed phenomenon in the area of organizational dynamics and development for the last 20 years, organizational change refers to a perplexing myriad of phenomena, activities, initiatives, and campaigns in organizations that have one thing in common: movement of some sort from one set of thoughts or behaviors to another set of thoughts or behaviors.

This movement can be distinguished in terms of scale or size and magnitude or comprehensiveness. It can involve the entire organization, or a subsystem (department or functional unit) of an organization. It can seek to transform the entire organization, as in an organization moving from a traditional authoritative hierarchy to a participative, flatter structure or moving into unfamiliar markets with a new strategy; or it may seek incremental changes, as in an organization retooling for the latest technology-assisted production, introducing new employee personnel forms, or new ways for teachers to record grades. Change can also be remedial—seek to correct small problems—or developmental—rethink the way some things are done so that the same problems do not recur.

It may be also be productive to distinguish change from other concepts and terms that are associated with change and sometimes used as synonyms.

Change

A most simple definition, but one that is also comprehensive might be movement from one comparatively, temporally stable state to another temporally stable state.

Organizational change occurs with those situations in which performance of job functions require most people throughout the organization to learn new behaviors and skills. Major change encompasses an entire workforce and can focus on innovation and skill development of people (Data Warehouse Glossary, n.d.).

Note that the new learned behaviors and skills are expected to be comparatively stable, at least for a while.

Learning

According to Chris Argyris, learning can be in one of two forms: (a) error correction or (b) examination of the thinking that produced the error in the first place. The first is called single-loop learning. The second is called double-loop learning and more closely resembles change as used in this chapter.

Innovation

Innovation is a term usually reserved for new products or services with remarkable improvements over previous products or services. An "innovative" product or service is

one likely to be dramatically different in design, delivery, or effect upon consumer, a difference that results from thinking about the product or service in ways not anticipated by the status quo or current way of thinking. For example, bar codes on products is/was innovative in that it eliminated the needs for price tags, pricing guns, pricers, and cashiers to read price tags; the advent of the digital camera is innovative because it does not use film; online banking is innovative because it does not require trips to the bank and personal transactions with bank tellers; some K-6 educational software is innovative because it teaches children to think and solve problems holistically and collaboratively to sustain the planet for good test grades rather than linearly and individually. Consumer products without prices, photography without film, banking without banks, and education without tests can certainly be considered innovative.

Development

Development is a term usually used to indicate measurable progress toward a stipulated, desired goal and usually reserved for individuals, groups, and organizations to indicate the state of progress, preparation, or readiness for goal achievement.

Change Agent, Change Agency

It is also important to distinguish between the agent of change, and the source or cause of change. The latter is attributable to a perceived or felt "discrepancy" between where the organization is and where it wants to be. This discrepancy can be perceived or felt by anyone in the organization but usually comes from those who are able to have a sense of "what could be" or "what needs to be," relative to "what is." Four primary areas in which this discrepancy can be felt are

- strategy, as in the suspicion that the current strategy is not working, or that a different one may be more productive for the future:
- technology, as in the suspicion that an organization's current IT system is not providing information as fast or as comprehensively as it should;
- organizational structure, as in the suspicion that informed participation by lower line supervisors may enhance decision making at the managerial level; and
- people, as in the suspicion that lower line supervisors possess neither the confidence or competence to participate in managerial decision making.

A change agent or agent of change, by contrast, is one whose intentional actions initiate, facilitate, or otherwise cause the desired change to be accomplished—a movement from one set of thoughts or behaviors to another on the part of a larger group such as an organization or society. In the contemporary organization, a change agent is typically associated with a change in the organization's culture.

Change agency may be thought of as the mechanism or means by which change is accomplished. It may refer to the those intentional actions—in whole or in part—on the part of an agent, or it may refer to abstract phenomena or circumstances external to the organization (e.g., new city ordinances that allow/disallow the sale of alcohol sales for eating establishments, new zoning regulations that prevent emissions from manufacturing plants during certain hours, or the demise of a competitor). In these cases, we can say that change has happened, but the mechanism through which change is accomplished is complex and nebulous, and not fruitfully traceable to a particular agent or agency. More often than not, however, a change agent will be a human being, and change agency will refer to the actions of this human being.

THE SHORT HISTORY OF ORGANIZATIONAL CHANGE AGENCY

It may be surprising, but despite all that has been written about organizational change and change agency, a detailed history of the concept and/or the practice is not among those readings.

Kleiner's (1996) *The Age of Heretics* stands out as perhaps the most valuable account of the practice of organizational change and the agents engaged in those practices. Located precisely at the site of mid-20th-century counter culture, Kleiner attributed the contemporary origins of the practice of organizational change agency to the decades 1950–1970, where change agency constituted heresy in the long-established traditions of managerial and bureaucratic corporate control. Indeed, much of what constitutes change agency today derives from those "heretics, heroes, and outlaws" who saw human spirit withering at work and sought means to resurrect it against mainstream corporate concerns and fiduciary values.

Although there are no academic histories of change agency that correspond to Kleiner's (1996) chronology of the practices of the original renegade change agents, intellectual histories can be pieced together from predominant strands of intellectual thinking at various periods in the past 60 years or so. Caldwell's (2005a) account may be considered as a noteworthy effort, in that he classified intellectual thinking about change and change agency into four essential discourses:

Rationalist discourses are built on modernist premises of
the rationality and logic of science and on the hope that it
will provide a stable, orderly, predictable world. Rationalist discourses employ a notion of a central, expert change
agent, one who knows—or one who assumes he or she
knows—what needs to be done and how to do it and who
presumes that changes imposed upon the unsuspecting are
fine as they are for their own good or for the ultimate good
of the organization.

- Contextualist discourses understand organizational change
 not in terms of an objective set of standards or invariant
 rationality, but as a naturally occurring product of management situations—that is, change is always understood in
 a context. Moreover, the context itself, much like each
 management decision-making situation, is dynamic and
 changing. Consequently, change is understood as emergent,
 and agency is understood as "doing what we can with what
 we have/know" or as "in context."
- Dispersalist discourses employ more contemporary and familiar concepts such as "team or "learning community" as the focus of change or agency. Here, the "expertise" of change and the power to conduct it are "dispersed" to management teams, rather than appropriated by executive level leaders. Such "dispersal" is coincident with empowerment and participation initiatives, and particularly popular in the 1990s downsizing movement.
- Constructionist discourses (all but) remove agency from the process of change. Relying on a postmodern set of philosophical assumptions, constructionist discourses tend to suggest that nothing really exists apart from our "constructions" of them through communication. Consequently, constructionist discourses view change as a permanent concept placed on an always impermanent dynamic, thus always subject to change via communication. Agency is largely a myth for the constructionist, as it would assume the stability of phenomena to change as well as the intentionality of the change agent. The part of agency that is not a myth for constructionists is the necessity of each individual to find ways to constructively adapt to or accept the dynamic conditions of postmodern work life.

Of note, all four previously mentioned discourses appear in the past 6 decades, though the rationalist discourse could feasibly be expected to be the apex of 400-year-old Enlightenment scientism. All in all, organizational change and agency do have a short history of approximately 60 years or so. But in that time, the nature of agency has changed from outside (external) consultants and academics, to both external and internal (usually HR) personnel, to "front-page" leadership personnel, to everyone in the organization in the form of teams and empowered workers, and ultimately to each individual worker.

That being said, however, many of the issues around which organizational change is initiated, and many of the issues involved with actual organizational changes, are ones that have persisted from the time when change agency first became an important phenomenon to study. Such issues concern the relationships and tensions between freedom and authority, the work organization and individual human spirit, productivity and worker satisfaction, and managerial control and employee voice—in short, the relationship of organizations and people—and are thus more or less universal. In the next section, I will use this dialectic in an effort to schematize the nature and kinds of change agency.

TYPES OF ORGANIZATIONAL CHANGE AND AGENCY

The past 2 decades have witnessed exponentially increasing interest in the concept and phenomena of organizational change. This intrigue has become manifest in academic literature, periodicals in the popular business press, as well as in guidebooks and manuals for internal OD practitioners and external consultants. It is possible to discuss organizational change from several political dimensions, numerous theoretical perspectives, a multiplicity of organizational levels, and a seemingly inexhaustible list of change tools, tasks, and agent characteristics. The nature and function of change agency will differ along these discussions, as will the necessary functions and characteristics associated with effective change agents.

In the following pages, I offer schemata that I believe to be more or less comprehensive but heuristically viable at the same time.

In Figure 91.1, we can first distinguish organizational change in terms of both philosophy and political direction; by political direction, I mean the means-ends construct, or the objectives of organizational change and how it achieves these objectives.

The entire scheme can be first distinguished by whether a conception of change agency is built on modernist or post-modernist assumptions. Modernist assumptions are those that retain Enlightenment scientism as an understanding of the nature of the world and how it works. An objective world, studied objectively (as science does), provides rational knowledge and objective truth about the world. Those that possess knowledge and truth—educated, enlightened, or divine—thus have power and expertise and are able to "impart" that knowledge to others. Such epistemological distinctions give rise to a whole host of beliefs about structure, authority, linear progress, and institutionalized power and knowledge upon which conventional organizational life is built.

Postmodern assumptions are those that reject modernist assumptions. Broadly, postmodern assumptions reject the idea of a "grand narrative"—an overriding conception of knowledge, truth, power, and authority—of anything. Thus, for postmodern thinkers, any sort formalized power should be resisted; institutionalized knowledge, in the form of academic discourses, for example, is just one form of knowledge that is no more viable on its face than any other form of knowledge; conventional organizational structure is no more viable than any other kind of structure, and regulated organizational practices are no more viable than less or unregulated practices.

The quadrants or windows in Figure 91.1 represent the political intent of change agency in terms of means and ends. Ends and means can be considered from both a managerialist/instrumental perspective and a choice/democratic perspective. The former denotes an overall or primary interest in traditional concepts and practices of

managerial control for the instrumental accomplishment of organizational goals. The latter denotes an overall or primary interest in those concepts and practices associated with democratic "control" for the participative or "collaborative" accomplishment of organizational goals. Consequently, the nature of change agency can be distinguished in the four ways indicated by each window I–IV in the chart.

- MI means, MI ends (maintaining instrumental control)
- MI means, CD ends (rational, expert-driven democracy)
- CD means, MI ends (formally democratic teams and communities)
- CD means, CD ends (grass-roots resistance, critical labor groups)

Ends Collaborative/ Managerial/ Instrumental Democratic II I MM MD Managerial/ Instrumental III IV DD \mathbf{DM} Collaborative/ Democratic

POSTMODERN

Figure 91.1 Political Direction: Means and Ends of Change

Managerialist Means, Managerialist Ends

Type I organizational change is predominantly characterized as strategic and planned. The objectives of the change are conceived in terms of greater efficiency, productivity and bottom-line profitability. Type I organizational change is typically "rolled out" from the top of an organization where organizational expertise is vested, and it is thus driven by the agency of organizational leadership. Typically, but not necessarily, a strategy, productivity, or performance consultant assists organizational leadership in the design of the change.

Managerialist Means, Democratic Ends

Window II represents perhaps the most salient and persistent features of change agency as we know it today, and it is perhaps the original form of change agency. Type II change agency is not "managerialist" in the strict sense of control and accountability, but would be accurately characterized by modernist assumptions. In this kind of change, "expertise" is retained in the form of a consultant using a linear, rational model of change. The change model of Lewin—unfreeze-change-refreeze—is perhaps the prototypical example of this type of change and is practiced by nearly all agents in the Lewinan tradition in early decades of organizational change agency (e.g., Argyris, 1993, 1994; Schein, 1995).

Importantly, though Type II change is based on modernist assumptions and is managerialist or instrumentalist in its means, note that it is a "benevolent" instrumentalism. Type II change employs therapeutic or helping interventions for enhancement of the human spirit and for communication and greater understanding, hence, equality at work—that is, for a more cooperative, collaborative, participative work-place. It is intended instrumentally to help the clients of change achieve a more democratic organization, ultimately as a model of what a better democratic society would look like. This type of change agency characterizes many of the heroes and renegades discussed by Kleiner (1996) as the originators or organizational change.

Democratic Means, Managerial Ends

Organizational change depicted by this window is by some accounts a sinister phenomenon. Here, the responsibility for change is democratically pushed down, delegated, or relinquished to what are often called teams. Empowered, participative teamwork appears not to have to operate within the constraints of formal authority, executive leadership, power, or expertise. However, teams are still circumscribed by explicit organizational goals, so that the apparent freedom offered by the delegation of authority and expertise remains confined to the service of status quo managerial objectives.

Democratic Means, Democratic Ends

Type IV change agency is denoted by those efforts to democratically organize a better democracy (wider empowerment, fuller participation, and employee voice) in an organization. The most common form of this kind of agency is the labor union, but the labor union is perhaps more formalized than democratic means-democratic ends (DD) change intends. DD change represents more of a grass-roots phenomenon, activities initiated by comparatively powerless workers, and uninfluenced by extant organizational power/authority/expertise, structure, or hierarchy.

As you can easily surmise, the characteristics and functions of an effective change agent will not be the same for each type of change. In Figure 91.2, I have aligned potential agents of change with the type of change in which they would most likely be effective.

CHANGE AGENT ROLES AND CHARACTERISTICS

As implied by the previous discussion of the types of possible change in an organization, the actual agency of change

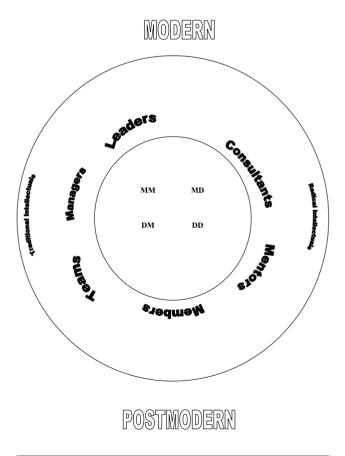


Figure 91.2 Change-Agents Aligned With Means and Ends of Change

may come from anywhere in an organization, or perhaps from some places outside of an organization. In Figure 91.2, I have overlain seven potential role possibilities for change agency and aligned them with the type of change with which they are most likely to be associated.

Organizational Leaders as Change Agents: A Knowing and Telling Role

The role that organizational leaders have in change and as agency is simultaneously clear and complex. Organizational leaders—executive-level decision makers and CEOs—are often those in the best position to sense the effectiveness of current strategic plans, the viability of current strategic objectives, and environmental conditions pertaining to acquiring organizational intelligence and competition. In this sense, they are the agents that know what is to be done and how to do it, and thus, they tell others what to do.

In fact, in the 1980s as American organizations faced unprecedented international competition for the production of goods and services and thus attempted culture change on massive scale, most of the practical and academic literature about change concerned organizational leaders as the primary agents of change. Studies and stories abounded about the qualities and characteristics of organizational leaders who successfully transformed their organizations into more competitive organizations. As a result, most of what we have come to understand about the change agency of organizational leaders is a (slightly revised) form of leadership characteristics. Many such lists of characteristics appear on Web sites even today. A partial list includes strength, courage, desire to lead, self-confidence, personal drive, and cognitive ability.

However, the conventional perception of a powerful organizational leader as the single catalyst for change has been replaced in the past few years with a conception of change leadership—a role feasibly open to anyone. However, that revised conception is also accompanied by a more contemporary, revised list of characteristics—for example, flexibility, empowerment of others, desire to serve others, enhanced emotional intelligence, and continuing self-development.

All of that being said, in today's organizations, the actual role that executive leadership plays in change is confounded by a number of contingencies.

Formal Authority

Certainly, at least in organizations that share the more or less conventional notion of "hierarchy," the executive and directive power to accomplish change lies with this class of organizational decision makers. Yet that authority can be used in ways that increase resistance to change, cultivate increased fear and insecurity about change (even though there might be formal compliance), and ultimately interfere with effective change procedures. It does not have to, but it can. If a type of genuine or authentic authority can be derived from the formal authority, organizational leaders place themselves in a much better position as the agency of change. Genuine authority is benevolent. It comes from a sense of self that is fulfilled. It is directed toward a vision of a better organization that means better for the people that make the organization. It is empowering and enabling, not just directing change but also facilitating it by one's own example and model.

Time

No matter how committed or passionate a corporate leader may be about a change initiative, more often than not they simply do not have the time to be involved in every stage of the change process. While managers or organizational members may look to the executive level for leadership of the change, leadership often wonders why the management level seems to lack the competence or confidence to carry out the change.

A good part of this disconnect concerns the executive's responsibility to communicate change effectively to key personnel involved with the change. Many are both unfamiliar with the acute value of such communication and time requirements of crafting an effective communication plan.

The Wet Work

Organizational leaders are responsible for the fiscal health of the organization and, of course, for all of the technological and human resources that constitute a fiscally healthy organization. Yet, similar to the time constraints just mentioned, their ability or inclination to manage every step or to be involved in every meeting or activity is limited. However, their participation in the wet work does include the enablement and empowerment of others to get the work done, as well as providing the necessary resources.

More Effective in Other Roles (Associated With Change Agency)

Increasing research from both academic and practical contexts points to a change role for the organizational leader as a sponsor or champion of change. Indeed, such research indicates a great likelihood of failure on the part of change teams and individual change agents without the sponsorship of someone at the executive level. The responsibilities here include public endorsements of the change, communicating often in both formal and informal contexts with all relevant stakeholders in the change process, building networks and coalitions in support of the change, as well as perhaps many "hallway" conversations and discussions with relevant change agents and constituents.

Organizational Manager as Change Agent: A Performing Role

Perhaps because of the same myriad of forces that affected more traditional notions of organizational leader as change agent, managers have increasingly found that any agency role in organizational change process has come to be defined more or less for them rather than chosen by them. As the past 2 decades have produced rampant organizational culture changes, downsizing, and flatter organizational structures, two sets of forces have converged upon managers to define their change role. First, managers have been on the receiving end of most of the responsibilities for the wet work of change programs. This is because change activity is usually a planned process amenable to the conventional understanding of what managers do-plan, control, organize, and direct. Consequently, most of what appears in the popular business press about change is actually change management—prescriptions, advice, or best/worst case scenarios for how to manage change effectively.

But second, as cultures and functions changed with newer, leaner, more nimble, and dynamic structures, management finds its conventional roles redefined into that of encouraging participation, empowering others, getting others to be receptive to and involved in change efforts. This becomes a rather stressful dilemma: Managers must manage both up and down, making them both the agency of change as well as an object of change. Redefined management roles require softer people management skills, but success in management is in essence a fiercely competitive endeavor. Thus, the manager's mode of agency in the change process could be called performing.

Teams as Change Agency: Still Performing

The idea of organizational teams (not groups of individuals) functioning as change agents results from the same forces as affect leaders and managers. Teams and teamwork emerged in the 1990s because of the widespread corporate interest in reculturing organizations in the 1980s. Although the synergistic and holistic properties and effectiveness of groups had been noted by social psychologists several decades earlier, it was not until cross-functional collaboration became a necessary organizational reality (or the inevitable residue of the "participation" required by downsizing), that teams emerged as a legitimate organizational entity.

The capacity of teams for change agency comes in two forms. First, there is the original notion of the "cross-functional" team. This group, usually composed of several members of various functional units across an organization, was given complete responsibility for a particular project, as well as the charge of overall "continuous improvement" of production, coordination, or business processes. However, the team construct is characterized by greater flexibility and more creativity in its work than is provided by the conventional managerial unilateral span of control. The skill set required to fully utilize this greater creativity

and flexibility is often trained into the group, in the form of better communication skills, training in group dynamics, conflict resolution, effective listening, and alternative modes of thinking and problem solving. This creativity and flexibility is put to work in the service of innovation in services, products and work processes, and hence possess an agency for organizational change.

Note that I have aligned teams in the bottom left corner of Figure 91.2, indicating that they are a postmodern phenomenon; power is formally pushed down or dispersed to the team, so at least formally the means of potential change agency are democratic. However, teams are inherently designed to achieve managerial ends. That is, the team responsibility is an even further devolved phenomenon of agency—from manager to team.

In my discussion of that quadrant of Type III agency, I noted that it may be seen as sinister. In this sense, teams (and change-agent managers, for that matter) are bound by a sort of paradox that awards them creativity and flexibility, but to be used within and to achieve organizational objectives. Some academic writers have noted that the paradox is a sort of invisible discipline—not the kind that comes from the explicit unilateral control of a manager, but from the inside of each group member as they now have to engage in a kind of self-surveillance of their creative and relational selves to achieve group effectiveness.

Also note that while the change agency of crossfunctional teams does reach for innovation, rarely does the flexibility or creativity allow them to transcend extant organizational goals and controls. Thus, the agency of crossfunctional teams for larger, systemwide transformations is limited.

A second kind of change capacity that currently accrues to teams is that of learning. Popularized in the past decade as a mechanism for organizational learning and the learning organization, teams are taught to think more holistically or systemically about projects and processes. Informed largely by recent resurrections of the nonlinear dimension of system dynamics, teams are thought to be able to see not the short-term picture or quick-fix solution, but rather the implications of any project for the long-term sustainability of the organization. Teams learn and, thus, acquire change agency, not only when they solve problems for better products or services, but also when they learn how to learn together. This requires a skill set that even today is unfamiliar and largely resisted—that of not just talking together, but exposing and examining the assumptions behind ideas; learning to suspend our own ideas and judgments of other's ideas, to engage in dialogue and not be concerned about winning or making our point.

By all academic accounts, the capacity for change agency accruing to this kind of team could be immense. Not just in terms of the problems addressed by learning teams, but in the collaboration and relational processes involved with this teamwork. By supportive academic accounts, this is the mechanism for holistic, large-scale, systemwide transformation. And if the organizational change is a model for

societal and global change, then these as well. However, there are few, if any, reports published in peer-reviewed academic journals of organizational learning practitioners ever changing anything through teams in this way.

This capacity for change agency is attractive, optimistic, and hopeful. Nevertheless, this hypothetical capacity is limited by significant concerns about organizational politics and power, in both interpersonal and group contexts. First, is it possible for individual organizational members—regardless of a tremendous commitment to group effectiveness—to achieve this ideal form of interaction and collaboration? Second, how can such optimal relational processes—the core of the learning team—be diffused throughout an organization?

Despite the potential of learning teams, and because of the more or less traditional managerial ends associated with cross-functional teams, the modality of the agency for teams is that of performing. Interestingly, as with change leadership and change management, change teams are now a necessary mechanism for undertaking significant organizational change. Similar to a cross-functional team in composition, but having the characteristics and functions of a change manager, such teams are responsible for implementing change across organizational boundaries, functions, and levels.

Consultants as Change Agents: A Helping Role

Perhaps the most discussed and visible kind of change agency in the past one half of a century is that of the external organizational consultant. Consultants are both lauded and despised in the relevant literature, their function once publicly characterized as "witch doctoring." Nevertheless, although their glamorous popularity may have waned since the 1980s, rare is the organizational leader or manager who would initiate a change initiative—for strategy, technology, structure, or people—without the expertise of a consultant.

I have aligned consultants with Type II change agency, which indicates instrumental means for democratic ends. This is perhaps my own subjective preference, my sentiment, if you will, as this was the process type consultation activated by the original change agents in the mid-20th century, ultimately in the hope of producing a more democratic organization for a more democratic society. As more organizational change is devoted to issues of people, participation and stakeholder relevance, this type of change and agency will continue to retain its original importance for some time to come.

Consultants could just as easily have been included on the left side of Figure 91.2 to identify those strategy, performance, or productivity consultants who specialize mostly in subsystem, remedial, or incremental change or in making recommendations as to bigger picture change. This group would also include those consultants who specialize in building more effective teams, or management development consultants who build more effective managers, often training both in the new or soft skills required by today's organizations.

Either way, the consultant as change agent could have a multitude of functions, depending upon specialty area of expertise, and particular methodology. These could include any combination of advising, assessing, diagnosing, implementing, training, developing, and evaluating outcomes of change programs. Strategy consultants primarily assess, advise, and make recommendations. Typically, strategy consultants rarely intervene in the systems they assess, though an increasingly common subspecialty of strategy consultation focuses on managing or oversight of the implementation process, similar to change management. Performance or productivity consultants typically assess, advise as to what needs to be done, design and/or develop training, and then turn the training process over to in-house training personnel.

However, I characterize the primary modality of this kind of change agency as helping in much the way a doctor helps a client who seeks treatment or counsel. On this model, one of the primary functions of a consultant is to intervene and change the system they are studying. Lewin, perhaps the first organizational consultant-change agent, is reported to have said, "You cannot understand a system unless you try to change it" (reported in Schein, 1995, and in Kleiner, 1996).

This is the dictum for thoughtful, solid, interventionist work, found in the process consulting work of Schein (1995), Argyris (1993, 1994), and others in Lewin's tradition.

Intellectuals as Change Agents: An Advising Role

This may seem an odd entry in a compendium of 21st-century management issues. In fact, two of my most favorite quotations would mitigate against its inclusion. The first is the classic Marxian statement from his *Theses on Feuerbach:* "Philosophers have only interpreted the world in various ways; the point is to change it." The other is much more contemporary, from postmodern commentator Clegg (1990): "Intellectuals don't legislate easily on the meaning of the world anymore; if they do, hardly anyone is listening."

My sentiment for such quotations is located in my desire for actual, rather than theoretical, organizational and social change. At the same time, the quotations reflect an almost insurmountable gap between the theory of change and the practice of change. Change is a practical, not a theoretical phenomenon.

In fact, the model for intellectual as change agent has its origin in the Enlightenment, as groups of writers and thinkers called *philosophes* became social commentators, as well as advisors to kings and nobles. This group of intellectuals is primarily responsible for interpreting and disseminating the thoughts of philosophers concerning science and democracy, activities that were directly contributive to both a revolution and massive social change, on two continents.

Note that these two main engines of the Enlightenment—science and democracy—still power most if not all of our thinking about the world 400 years later.

Intellectuals can have a similar function today, to the extent that theory can be derived from practical applied knowledge, and practical, applied knowledge can be derived from theory. This would involve a host of changes in the ways intellectuals do their work, but perhaps foremost among them would be the desire to make academic research available to the working public. Postmodern commentator Baumann (1987) has proposed a viable role for the contemporary intellectual—that of interpreting the theoretical work for the popular audience and practical application.

It may be instructive to distinguish intellectuals into two very broad categories that correspond roughly to Figure 91.2.

Traditional intellectuals would be those whose theoretical, research, and other academic work contributes to a broad understanding of organizational theory, management and change from a conventional managerial perspective, and within a conventional managerial paradigm. Though innovative and perhaps revolutionary in their time, the culture work of Peters and Waterman or of Deal and Kennedy might be considered such work in that their aim was to strengthen traditional American organizations for increasing global competition. Other more contemporary business/management intellectuals that come to mind might be Thurow, Porter, Kotter, McGregor Burns, and certainly, Drucker fits the category. Sometimes the intellectual work of these people drives lucrative consulting practices; sometimes it rather contributes to the body of academic knowledge only.

Radical intellectuals, for lack of a better term, would be those who theorize and speculate not necessarily about how we can be more competitive, manage or lead more effectively, be more productive, be more satisfied at work, or in general work better, but about the nature and necessity of work itself—the arbitrary imposed distinctions between work and life, unquestioned assumptions about the nature of authority, and structure and subordination.

Such intellectuals tend to see the organization of work as overdetermined in the first place. Most intellectual work of this nature derives from the "critical" program of organizational and management study and sees the work organization as a site of domination—that is, unnecessarily restrictive of human freedom and dignity—and as having "colonized" our nonwork life. The overall goal of the writing of these intellectuals is a more liberated or freely chosen set of work options, circumstances, and structures on the part of workers.

Curiously, no published reports indicate that the writing of these intellectuals has ever liberated anyone from anything. However, we may note that participative management schemes, empowerment initiatives, and increasingly flexible work-life balance options tend to reflect the sentiment of the radical intellectual. Additionally, as I have written elsewhere, the aims and aspirations of organizational learn-

ing as well as much of the applied interventionist work it offers, very closely resembles the goals and tenets of the radical intellectual in the critical program.

Teachers as Change Agents: An Enlightening Role

I have not included teachers in Figure 91.2, because they could be located anywhere. The teacher, especially a university instructor or professor but any teacher really, is in the most viable position for change agency outside the actual organization. Teaching may be that role described by Baumann (1987) as interpreting, using theory to cultivate practice, or using theory to critique other theories. It may seem quaint, but it is true: Ask any successful person for the most influential person in his or her life, and he or she will point to a teacher.

A passionate, enthusiastic teacher with pedagogically sound methods literally frames the way a learner receives and interprets information. Consequently, a teacher's change agency lies in the way information is framed. A teacher can frame accepted wisdom in conventional ways for a mainstream understanding; or new ideas can be cultivated in unconventional ways for an alternative understanding. Unfortunately, most management education at the university level proceeds by way of the former: bound by accreditation standards and market-driven curricula, there is little if any latitude for alternative or unconventional understandings. That being said, the passionate teacher committed to the ideals he or she envisions may always be able to find agency in the materials and methods employed.

For example, unless one were to dig deep into the history of organizational development or to be very familiar with the theory and principles of systems design, one would not ordinarily recognize the name Jay Forrester. Yet, any OD specialist or consultant worth half of their salary would know about organizational learning and the name Senge. Forrester was Senge's teacher and, in some respects, his mentor. Forrester wrote and thought great things, some of which had an impact at the time. But the overwhelming significance of Forrester's thought for contemporary management and organization theory might still be dormant if not for Senge (1992) bringing them back to life as the systems principles of The Fifth Discipline. And the impact of *The Fifth Discipline* is unmistakable. My point is that teachers (and mentors) can be change agents—indeed should be-whose influence may not be felt or known until much later.

Mentors as Change Agents: An Action Role

As I have written elsewhere, the agency of the mentoring process in organizational change has been grossly undervalued or overlooked altogether. Although mentoring has become a popular topic in recent years, there is not much to indicate that its study or practice has changed much from conventional notions.

Mentoring involves a dyadic relationship, usually between a senior experienced member of an organization and a junior inexperienced member. Traditionally, the objective of mentoring has been for the mentor to pass on his or her accumulated wisdom regarding task competence, managerial skill, and political awareness to the protégé, for the efficient development of the protégé. As mentoring is a dyadic relationship, I believe the nature of this relationship defines or circumscribes the potential of change agency in mentoring.

Mentoring can be designed as a traditional learning, or developmental relationship, where the objective is the development of the protégé. This is accomplished by the mentoring transmitting all relevant cultural, political, and task knowledge to the protégé in the form of extant organizational wisdom. Here, the protégé learns, but only in an incremental way—in Argyris' (1993, 1994) terms, a single-loop way of correcting errors and doing things right or in the prescribed, accepted manner. We can say that change is happening, but certainly not outside of accepted parameters.

Alternatively, if a mentor role is designed as a more therapeutic one (and mentors appropriately qualified and credentialed), significant change could possibly be observed even in within accepted parameters. Such changes may be in the form of an increased behavioral repertoire, enhanced personal mastery, improved decision making, and an openness to new learning. Some of these carry forward, as not simple error-corrections, but as generative preparation for novel experiences.

By contrast, we could view mentoring as what Argyris (1993, 1994) would call a double-loop enterprise—designed to explore, invent, examine unexamined organizational assumptions, ask unasked questions, and otherwise discuss the undiscussable.

This requires a different sort of relationship and interaction, one where the communication is not confined to transmitting information, but rather exploring possibilities and appreciating differences. Here, we have the potential for quantum generative change on the part of both mentor and protégé, as well as the potential for double-loop learning to be diffused throughout the organization.

I have called this modality of change action, as it takes place in actual organizational practice, in the dynamics of interpersonal interaction in organizations.

Organizational Members as Change Agents: An Activist Role

Unfortunately, but usually, far down on the priority list of organizational demands and constraints are the concerns and needs of the masses of organizational members. In fact, most of the preceding discussion features the change agency of organizational members with specific, visible roles, while the ordinary organizational member recedes into the background—their only role as that of having change "done to them."

I have aligned members with Type IV agency, as most member concerns have to do with increased voice, choice, recognition, means for satisfaction, and participation—that is, democratic concerns. As finding formal means and channels to address such concerns is often a futile enterprise, change initiatives to address them are/must be organized democratically, as a grass-roots phenomenon, from the bottom up.

Can organizational members" in the invisible way the quote marks suggest, have any change agency? Many think so, and though perhaps difficult, it is not impossible to acquire and wield change agency from this perspective.

Tempered radicals is the name given by Meyerson (2003) to those workers who may be disenfranchised or alienated from their jobs or organization; perhaps very committed and loyal members who desperately want to see change but seem powerless to effect it; those like Meyerson herself who felt "misaligned" with her profession and wondered why; perhaps managers caught in the constant daily squeeze of managing up and down; or those that find a home, family, personal, or social life nearly impossible with 24/7 accessibility by the organization via pager or Blackberry. These and folks like them tend to say "this has got to stop" a lot. But they may like their jobs and want to keep them; they may like their professions and want to stay in them. As Meyerson said, "[T]hey want to rock the boat and stay in it."

But how does one change it with little means and usually no formal power? This kind of change agency starts with an assessment of self, what self really wants out of work and life, and what self can do to change things. This requires coming to an understanding that is consistent with both the external constraints of the situation as well as internal aspirations and desires. Organizational members can reach for this understanding at any of three levels: intrapersonally, by silent or psychological acts of resistance, or by seeing the opportunity involved in obstacles and threats; interpersonally, by engaging like-minded others in conversations or by finding the courage to negotiate for what you want in the face of power; or collectively, with a larger number of like-minded people. Some theorists suggest critical labor groups or shadow core groups that meet and discuss ways an organization stifles change and ways to accomplish it. All of these possess agency through their active resistance of an undesirable status quo.

THE SUCCESS AND FAILURE OF CHANGE INITIATIVES

With all of this talk about agency, we would think that change happens a lot in organizations. It does not. An estimated average of 70% of all organizational change initiative fail, and that estimate has been steady for a decade.

The success of change initiatives is generally attributable to visible executive sponsorship of change including procuring adequate resources for the change, when execu-

tive sponsorship is coupled with management and when employees are informed about how to support the change. The failure of change is generally attributable to ineffective or conflicting leadership, unclear goals, and ineffective planning.

AUTHOR'S NOTE

The author recommends that students interested in further reading begin with the work of R. Caldwell. This work is perhaps the most comprehensive and authoritative voice to date on the subject of change agency, and this essay is indebted to it in many ways.

REFERENCES AND FURTHER READINGS

- Argyris, C. (1993). Knowledge for action. San Francisco: Jossey-Bass
- Argyris, C. (1994). *On organizational learning*. London: Blackwell. Argyris C., & Schon, D. (1978). *Organizational learning*: *A theory of action perspective*. Reading, MA: Addison Wesley.
- Baumann, Z. (1987). *Legislators and interpreters*. Ithaca, NY: Cornell University Press.
- Bokeno, R. M. (2000). Dialogic mentoring: Core relationships for organizational learning. *Management Communication Quarterly*, 14(2), 237–270.

- Bokeno, R. M. (2003). Introduction: Appraisals of organizational learning as an emancipatory project. *Journal of Organizational Change Management*, 16(6), 603–618.
- Caldwell, R. (2001). Champions, adapters, consultants and synergists: The new change-agents in HRM. *Human Resource Management Journal*, *11*(3), 39–52.
- Caldwell, R. (2003). Models of change agency: A fourfold classification. *British Journal of Management*, 14(2), 131–142.
- Caldwell, R. (2005a). Agency and change. London: Routledge.
- Caldwell, R. (2005b). Things fall apart? Discourses on agency and change in organizations. *Human Relations*, 58(1), 83–114.
- Clegg, S. (1990). Modern organization. London: Sage.
- Data warehouse glossary. (n.d.). *Information technology at California State University Monterey Bay*. Retrieved September 8, 2007, from http://it.csumb.edu/departments/data/glossary html
- Kleiner, A. (1996). *The age of heretics: Heroes, outlaws and the forerunners of corporate change*. New York: Currency Doubleday.
- Meyerson, D. (2003). Tempered radicals: How everyday leaders inspire change at work. Boston: Harvard Business School Press.
- Schein, E. (1987). *Process consultation*. Reading, MA: Addison Wesley.
- Schein, E. (1995). *Kurt Lewin's change theory in the field and in the classroom: Notes toward a model of managed learning* (Working Paper No. 10.006). Cambridge, MA: Center for Organizational Learning, MIT.
- Senge, P. (1992). *The fifth discipline*. New York: Currency Doubleday.

Organization Development in the 21st Century

CHRISTOPHER J. REES

University of Manchester

rganization development (OD) features prominently in organizational change management theory and practice. Early forms of OD emanated from the United States approximately 50 years ago and since then OD has been widely applied in organizational settings across the world including in Asia (Rao & Vijayalakshmi, 2000), Africa (James, 2004) and Eastern Europe (Perlaki, 1994).

The content of the chapter is structured as follows. The introductory sections examine the nature of OD and the philosophy that has traditionally underpinned it. Later sections of the chapter pursue these themes in more depth by exploring (a) a variety of techniques that have traditionally been closely associated with OD, (b) ways in which OD has evolved over recent years, and (c) challenges that currently face those working in the field.

WHAT IS OD?

"Organization development" (OD) is an ambiguous phrase associated with the theory and practice of change management in organizations. For reasons explained in this chapter, OD is difficult to define. The phrase OD certainly means different things to different people. This lack of a standard definition can be particularly confusing to those who are new to the subject. However, early in this introduction, it may be helpful to highlight that, in recent years, the practice of OD has become more closely associated with disciplines such as human resource management (HRM) and human

resource development (HRD). One indication of these links between OD, HRM, and HRD is that in countries such as the United States and the United Kingdom organizations regularly advertise for full-time OD practitioners in HR professional journals.

At the outset, it should be noted that the origins of the phrase OD are difficult to isolate. French and Bell (1999) suggested that the term OD probably emerged simultaneously in two or three places. This absence of a clearly identifiable founding theorist of OD may help to explain why there is no standard or universal definition. Similarly, it is impossible to pinpoint the date on which OD was introduced to the world, though the work of influential OD theorists such as Lewin, Likert, Lippitt, and Beckhard tended to emerge in the 1940s, 1950s, and 1960s. However, while the origins of the term OD are rather unclear, there appears to be a consensus surrounding its general aims; that is, as the label suggests, OD is about developing organizations and individuals through the use of carefully planned change-management interventions.

Despite the lack of a universally accepted definition of OD, readers may find it helpful to be provided with two often-quoted definitions. Beckhard (1969) defined OD as an effort planned, organizationwide, and managed from the top to increase organization effectiveness and health, through planned interventions in the organization's processes using behavioral science knowledge. Burke (1994) defined OD as a planned process of change in an organization's culture through the utilization of behavioral science technologies, research, and theory. When viewed side by side, we can

glean various insights into traditional OD from these two definitions.

First, both definitions draw attention to the fact that OD is about planned change within organizations. OD theorists propose that OD processes and interventions should proceed in identifiable stages. Thus, to some extent, OD is prescriptive in that proponents argue that OD should be planned and implemented in a sequential manner. As Massarick (1990) pointed out, the very term development, whatever its context, implies a succession of changing sets of conditions, presumably in some knowable and possibly ordered sequence. This ordered sequence often involves (a) a preliminary stage of embarking on the OD process by, for example, isolating an organizational issue that needs to be addressed and then contacting an OD practitioner to facilitate an OD intervention; (b) undertaking diagnostic activities and using interviews, questionnaires, and observations in order to identify key issues that need to be addressed; (c) feeding back the information gathered via the diagnostic process to people within the organization; (d) designing and implementing interventions; (e) evaluating the OD interventions. The OD sequence should not be seen as a one-time event but rather as a continual process.

Second, both definitions identify the behavioral sciences as providing the theoretical backbone of traditional OD. The phrase "behavioral sciences" highlights that OD is multidisciplinary; it draws on knowledge from fields such as psychology, sociology, management, and anthropology. This knowledge relates to subjects such as motivation, goals, attitudes, leadership, values, psychological development, teamwork, and culture. Further, the word "behavioral" provides a clear indication that traditional OD is principally focused on people in organizations. For example, a work system may well attract the attention of an OD practitioner in a particular setting primarily because this system is having an impact on people's behavior.

Third, the definitions of OD incorporate the phrases "organizational culture" and "organizationwide." These phrases draw attention to the long-term holistic nature of OD. OD interventions are intended to bring about changes to the all-pervading cultures that exist within organizations through the development of individuals and work processes. OD is intended to affect all aspects of organizations and the people who work within them. For this reason, OD theorists see the involvement and support of top management as an essential element of the OD process. The holistic nature of OD is also reflected not just in terms of people and processes within the organization, but also in terms of the wide-ranging scope of OD theory and practice. For example, one recent analysis of OD research literature (Piotrowski & Armstrong, 2005) identified the top 25 topical areas of research into OD, which were extremely diverse. They included leadership, international/cultural issues, organizational theories/models, technology, ethics, strategic planning, employee productivity, diversity, organizational conflict, partnerships, team building, total quality management, and downsizing.

Fourth, Beckhard's definition proposes that the overall aim of OD is to increase organization effectiveness and health. These terms should be considered carefully for they reveal more of the inherent nature of traditional OD. The term effectiveness when used in this context is not synonymous with, for example, profitability in business organizations or key performance indicators in service organizations. Similarly, "organization health" is not necessarily referring to physical work surroundings or sales figures. Organizational effectiveness and health in this context refer to something more subtle than output measures (e.g., sales and profit) and physically safe environments. Rather, these terms provide an indication that traditional OD is about creating organizations in which people can work together, develop, grow, and obtain a sense of fulfilment. Using the language of OD, an effective and healthy organization is likely to be characterized by features such as a supportive culture that allows members to communicate openly and without fear, shared values among the members including commitment to the mission and goals of the organization, and flexibility and a willingness to learn and change.

This underlying philosophy and value system that focuses on the development of organizations and people is arguably the hallmark of traditional OD. For example, Schein, a leading author in the field of OD, stated that he does not see OD as a set of techniques, but as a philosophy toward one can utilize to best work with organizations (Schein, 1990). When discussing definitions of OD, Egan (2002, p. 61) made a particularly helpful contribution when he points out that OD is frequently described as a field that is based on values and ethics. Egan also recognizes that that the defining feature of OD practitioners, as compared to other management consultants, is often seen as their emphasis on values. The subject of the values of traditional OD is discussed further in the next section.

OD VALUES

In order to understand the nature of traditional OD, it is essential to recognize that OD was built upon the philosophy, values, and assumptions of humanistic psychology: as Grieves (2000, p. 399) argued so succinctly, OD actually promotes humanistic values. Rees and Sharifi (2002) summarized this humanistic approach by pointing out that a fundamental tenet of humanistic psychology, as found in the writings of organizational theorists, surrounds the belief that employees will flourish and reach their true potential providing that their work environment is conducive to personal growth. Proponents of this humanistic approach such as Rogers (1969) and Maslow (1954) point to higher order needs such as the need for positive self-regard, the need to achieve, the need for status and recognition, and ultimately, the need for a person to fulfill his or her potential. The humanistic position emphasizes the person's search for self-knowledge, self-development, and the answers to the meaning of life. From a humanistic perspective, the key

to fulfillment and happiness lies within the person. This assumption is not universally endorsed, with alternative standpoints adopted by others including those who believe that the quest for true fulfillment should be externally directed toward God.

As just noted, a key condition for self-development and fulfillment is an environment that is conducive to psychological growth. Clearly, when used in this context, the term "environment" refers to far more than the physical surroundings that ensure physiological needs (such as safety and warmth) can be met. OD interventions based on humanistic philosophy aim to provide employees with an environment in which employees can, for example, find meaning in their work, take responsibility for tasks, and be given freedom and autonomy in the workplace. Such interventions often focus on empowering workers by giving them responsibility for their work.

The Organization Development Institute, which was established in 1968 to promote understanding of the field of OD, published a code of ethics in 1991. This code, which remains in place, includes 10 values that the Organization Development Institute proposes should be fundamentally important to OD professionals. It is not within the scope of this chapter to cite, in full, all of these values. However, even a cursory glance at this code reveals the extent to which humanistic philosophy pervades these values. The values contain words and phrases such as "quality of life, health, potential, empowerment, freedom, responsibility, dignity, integrity, openness, participation, and democratic decision making." Interestingly, while two of the stated values refer to effectiveness, efficiency, and stakeholder orientation, taken overall there are no direct references in these stated values to subjects such as corporate strategy, organizational objectives, and financial considerations.

In one attempt to summarize the values of OD (Deaner, 1994, pp. 437–439), it is proposed that three principal values can be used to describe the variety of values found in OD. The first of these values is participation. OD literature proposes that all people who are affected by change should have the opportunity to be involved in the change process, regardless of whether they choose to partake in this opportunity. It is argued that participation in the change process will create a sense of belonging and increase both individual satisfaction and the output of the organization. The second of these principal values of OD is shared power. This value extends the value of participation by stating that individuals who are affected by change should not just participate in the process but have a share in the decision making. The third value is truth. This value states that all people involved in the change process should tell each other the truth about their own feelings, as well as in relation to more objective information relating to, for example, resources.

A stark contrast can be made between the OD practices associated with these values and the management practices recommended by influential theorists such as Taylor. Taylor believed that work did not have to provide fulfillment per se but rather, work should provide the financial means to en-

able workers to obtain fulfillment and happiness outside the workplace. Taylor's scientific management approach placed great emphasis on factors such as planning, management control, supervision, discipline, task analysis, payment by results, efficiency, and output. In a nutshell, managers scientifically calculate the one best way to perform a task, select the people best suited to carry out the task, train these people in the one best method, and then pay them according to the output they achieve.

OD theorists and practitioners, on other the hand, emphasized the need for workers to obtain a sense of fulfillment directly from their work. Thus, unlike the scientific management approach, proponents of OD recommended giving workers more responsibility and freedom in the workplace, giving workers the opportunity to take decisions, and increasing the variety of work associated with a job role. Further proponents of OD encouraged people to work in teams and to communicate openly with each other and their managers. The next sections of this chapter highlight the role of OD practitioners in more detail and explore some of the techniques OD practitioners have traditionally used as part of their change-management intervention strategies.

OD TECHNIQUES AND APPLICATIONS

The employment status of OD professionals working within organizations varies tremendously. Some large organizations, particularly in the public sector, may have a discrete OD department comprised of a group of employees who consider themselves OD professionals. Other organizations employ OD professionals and locate them within the human resource function. Rather than employ OD professionals, some organizations contract external OD professionals to undertake interventions on a project or consultancy basis. The fact that these different types of arrangements exist indicates that there are advantages and disadvantages attached to both internal and external arrangements of this nature.

Regardless of whether they work as employees of the organization or as external consultants, the work of OD practitioners can be summarized as follows. Working in collaboration with key people within the client organization, OD practitioners typically facilitate a process whereby information about people and systems is gathered and analyzed in order to identify underlying issues that impact the effectiveness and health of the organization. Having gathered this information, the OD practitioner then encourages and assists the appropriate people within the organization to design and evaluate intervention strategies aimed at increasing organizational effectiveness. It is important to note that the OD practitioner does not design the interventions and then instruct clients about how best to proceed. Rather, the role of the OD practitioner is to help clients identify ways forward. In this sense, OD is collaborative and nondirective; that is, OD practitioners do not tell clients how to proceed but provide enabling mechanisms via which clients identify issues, problems, and alternative solutions. Part of the thinking behind this nondirective approach is that, for an OD intervention to be successful, clients have to take ownership of OD interventions by involving themselves fully in the process. OD consultancy has been described by Schein as "process consultation" as opposed to other forms of consultancy in which the consultant is expected to provide expert opinions about issues and problems and then make recommendations about how the client should proceed.

OD practitioners use a range of diagnostic techniques to help clients identify issues and design and monitor intervention strategies. Some of the most well-known techniques that have traditionally been associated with OD are highlighted and discussed next.

Force-Field Analysis

Lewin and his associates developed a number of wellknown OD techniques and applications (sometimes referred to as "OD technologies"). One of the best known of these is a model called "force-field analysis." As part of this model, Lewin proposed that the position of an organization is maintained by a field of forces that act upon one another until a state of equilibrium is obtained. In order to bring about planned change, the forces in operation have to be identified and changed in certain respects. These changes may involve increasing the strength of the driving forces (possibly by adding additional drivers) or, preferably, weakening the restraining forces to bring about the desired state or position. Lewin referred to the alteration of the forces in a field as "unfreezing." He stated that altering forces leads to the "moving" step of the planned change. Moving is associated with changes to organizational systems and structures, as well as to behavior. Once the desired state has been achieved, further action may be required to "refreeze" the position and achieve equilibrium. This three-component model of planned change has been developed, with various writers such as Schein offering adaptations to it.

The main criticism that has emerged of the force-field technique stems from its portrayal of the change process as a snapshot in time rather than as an ongoing fluid process in which, for example, today's driving forces may be tomorrow's resisting forces. This criticism incorporates Lewin's terminology, with critics questioning whether organizational systems and the attitudes and behaviors of people within an organization can ever be frozen. They argue that the change process is far more complex than the process represented by force-field analysis, with factors such as covert power struggles and selfish irrational behavior exerting major influences on change processes. Nevertheless, forcefield analysis remains widely used by OD practitioners. The model is easily understood; basically, it requires participants to identify a desired outcome for an organizational change program and then to explore the impact of factors that are driving the change process and factors that are preventing the achievement of the desired outcome.

T-Group Training

The humanistic underpinnings of OD just noted are clearly reflected in other methods developed by Lewin and his contemporaries. For example, "T- group training," sometimes referred to as "encounter-group training" or "sensitivity training," traditionally took the form of closeddoor intensive and unstructured events away from the workplace. T-group training involved participants sharing information about themselves and each other with a view to learning more about themselves, other group members, and the dynamics of the group. It was thought by proponents of this training that the feedback that individuals received during these sessions could be used to increase levels of selfawareness and ultimately lead to psychological growth, development, and personal fulfilment. Further, the increased levels of awareness of self and the group would subsequently lead to greater group effectiveness and the development of the organization. When writing about T-groups, Burke (1994) states that the feedback participants receive from one another regarding their behavior becomes a source of personal insight and development; participants also learn about group behavior and intergroup relationships.

T-group training was designed to provide an environment where feedback and self-disclosure could be offered and accepted and, as a result, provide a means whereby people could obtain positive self-regard, fulfillment, and happiness. Unfortunately, not everyone appeared to benefit from T-group training. The open and direct feedback that is an integral element of this form of training exposed some participants to feelings and experiences that they simply could not handle. Further, the direct relevance to the workplace (or face validity) of this training, which, as previously noted, was sometimes facilitated in a highly unstructured manner outside of the workplace, was not always obvious to the participants. So although T-group training represents a well-known aspect of OD practice, its use has tended to subside over the years. As Cummings and Worley (2005) note, the use of T-groups has declined as an OD intervention and have mainly been replaced with less touchy-feely team-building activities.

Attitude Survey Techniques

It will be recalled from the previous discussion that OD processes involve a diagnostic element; that is, detailed information about the organization and its members is needed to inform decision making surrounding change interventions. Early OD theorists sought to develop techniques that allowed them to examine the views and attitudes of people working at all levels of the organization. One major technique that was developed in the 1940s and 1950s by Likert and his team was the use of fixed-response attitude questionnaires. These questionnaires remain widely used by OD practitioners as a means of obtaining what they see as objective data from organizational members. In devising these fixed-response attitude questionnaires that include,

for example, five-category "strongly agree to strongly disagree" response scales, Likert and his team found that they were able to gauge employees' attitudes about a wide range of change-management related issues. Then, these attitudes could be monitored on a longitudinal basis to assess the impact of change-management interventions. For Likert and his team, the fixed-response survey technique had particular merit for it allowed individuals to participate in change-management processes by expressing views about issues that they might not have been willing to comment on in, for example, an interview setting. The quantitative information generated also allowed OD professionals to provide objective, concise, and comparative feedback to the top management about employees' attitudes toward issues such as leadership styles, reward systems, communication, teamwork, and the general climate of the organization.

Inevitably, the true objectivity of the survey technique has been questioned, in part because the fixed-response method relies on the constructors of the questionnaire taking decisions about what key issues should be included and excluded in the content of the questionnaire. Further, technical questions arise, such as how many response categories a response scale should possess, whether the scale should have an odd or even number of response categories, and what middle response-categories should be named—if at all. Nevertheless, the fixed-response attitude questionnaire technique that was developed by early OD theorists remains highly popular within OD. Further, it has been widely applied within the social sciences more generally, with applications covering diverse subjects such as personality testing and market research. Indeed, fixed "strongly agree to strongly disagree" response scales used across the social sciences are commonly referred to as Likert-type scales.

Action Research

Another well-known technique that emerged from OD is action research. The phrase action research has been attributed to John Collier, a British politician who worked in India between 1933 and 1945 (see Burke, 1994, pp. 54–55). In the action-research model, change is seen as an ongoing activity. Information gathered through research is used to inform the action that is taken in the change setting. The results of the action are then evaluated and this evaluation process is used to plan further actions. It is important to note that research in this context may involve accessing "academic literature" in libraries. However, it is much more likely to involve OD practitioners gathering information from organizational members using techniques such as interviews, questionnaires, and group discussions, as well as using nonobtrusive methods such as observing workers and analyzing organizational documents. It should be highlighted that the originators of action research saw the technique as means of not just addressing immediate organizational issues and problems, but as a mechanism for providing knowledge and facilitating learning about the wider social system.

Senior describes action research as a collaborative effort of data gathering, data discussion, action planning, and action between the leaders and facilitators of any change and those who have to enact it. Therefore, action research is, as its name suggests, a combination of research and action. This means collecting data relevant to the situation of interest, feeding back the results to those who must take action, collaboratively discussing the data to formulate an action plan, and finally, taking the necessary action (Senior, 1997). In this helpful explanation, Senior attempts to identify a number of distinguishing features of action research. First, she states that action research is not a one-time event, but rather an ongoing process. Second, she argues that action research is an iterative or cyclical process that should continue as part of everyday organizational life. Third, the model assumes that all who are or might be involved in any change should be part of the decision-making process to decide what that change might be and how to bring it about. This third feature is particularly consistent with the traditional values of OD previously discussed.

One important feature of action research is that it can be applied directly to issues that arise within organizations. As such, action research has not suffered from the face-validity concerns that surrounded T-group training. A specific organizational issue can be investigated and discussed; then an action plan formulated, implemented, and evaluated. Interestingly, criticism of the technique has arisen from within the field of OD. Some OD professionals have argued that action research has focused too much on immediate problems facing the organization and its members. These critics have argued that it is not achieving its potential for advancing social knowledge and human development (Cooperrider & Srivastva, 1987). It seems that the main strength of the technique in the eyes of managers, that is, the focus it placed on solving immediately apparent organizational problems, has become its weaknesses in the eyes of some OD practitioners who want to see action research contribute more fully to a wider social agenda. In more recent years, these criticisms have led to the development of new forms of action research such as action learning and appreciative inquiry. These new forms of action research retain its essential elements but encourage participants to explore more fully the organizational system as a whole, rather than focusing entirely on specific issues within that system.

Grid OD

Another important landmark in the evolution of OD was the development of what is termed "Grid OD" (Blake et al., 1964). Grid OD was popularized by the development of the Managerial Grid (Blake & Mouton, 1985). It was again based upon the early work of Lewin and his colleagues and presented a direct challenge to the overarching emphasis placed by classical theorists such as Taylor, Fayol, and Brech on nonpersonal production processes. Although key academic studies that emphasized the importance of social systems within organizations had emerged, they lacked an

associated and credible management technique. Grid OD was revolutionary in that it provided a practical approach to managerial training that espoused the critical nature of factors such as organizational culture, job satisfaction, quality of working life, teamwork, and personal growth (Harvey & Brown, 2001). In this way, Grid OD took mainstream humanistic philosophy and concepts and applied them to organizational life in a more direct manner than T-group training was ever likely to do. At the same time, Grid OD acknowledged organizational performance and output as key variables, thus providing the technique with face validity among managers. In fact, a cornerstone of Grid OD is that team management, which has a high concern for people and a high concern for production, is the superior one best style of leadership (Rollinson, Broadfield, & Edwards, 1998).

Despite early promise, the use of Grid OD, rather like Tgroups, has tended to fall away in the face of criticism from both theorists and practitioners. As just noted, the main tenet of Grid OD is that it is possible for managers to adopt an ideal "high concern for both people and production" leadership style that is superior to other styles of leadership that attribute preeminence to either people and production or a low concern for people and production. In summarizing the criticisms of Grid OD, McKenna (2000) highlights various concerns relating to Grid OD methodology, including a perceived lack of behavioral change following Grid OD interventions and the rise of situational leadership as a counterargument to the one best style approach advocated by Grid OD. Fredericks and Stewart (1996) summarize these criticisms of Grid OD from a personal perspective. They state that they do not believe that managers either can or do ignore either task or people and, as such, they reject the either/or school of thought. Neither do they accept that managers demonstrating concern for both task and people will be necessarily successful; thus they also reject both schools of thought.

The decline in the application of both T-groups and Grid OD as just noted are symptomatic of the manner in which OD has evolved over the last 50 years. Other examples of the emergence and decline of OD methods and techniques could be discussed, such as the Job Enrichment and Autonomous Working Teams approaches that grew out of the work of the Tavistock Institute of Human Relations. These changes and developments within the sphere of OD practice lead us to consider ways in which OD developed over recent years.

THE CHANGING NATURE OF OD

The Changing Context

In the preceding sections of this chapter, readers may have noted the use of the phrase "traditional OD." The use of this phrase represents an acknowledgement that, over recent years, there have been many debates about the extent to which the theory and practice of OD today differ from the humanistically based OD that emerged from the 1940s to the 1960s. At the center of this debate are questions surrounding the values of modern-day OD.

Before considering the ways in which OD has changed in recent years, it should be highlighted that OD emerged during and following World War II. One excellent review of Lewin's background and work emphasizes that the events of his era dominated Lewin's thinking and his input into OD. For example, as a German Jew, Lewin was dedicated to replacing Germany's authoritarian and racist culture with one that was enshrined in democratic and humanitarian values (Burnes, 2004). In view of this, Lewin's whole-hearted commitment to empowerment and democracy in the workplace become more easily understood.

The point made here is that contextual considerations have impacted, and will continue to impact, on the development of OD over time. Just as their experiences and the contexts in which they were working influenced Lewin and his contemporaries, OD theorists and practitioners today are likely to be influenced by the different contexts in which they work. In fact, there is clear evidence that those working within the field of OD in recent years have sought to identify the contextual and environmental conditions that affect organizations and hence affect the development of OD values, theories, and strategies in today's world. For example, Mozenter (2002) has highlighted five macro forces that he argues have a major impact upon organizational strategies and future survivability. These forces are changing technology, constant change, domestic and international alliances and partnerships, changing work structures, and increasing workforce diversity.

Similarly, Cummings, and Worley (2005) propose that there are four main contextual trends likely to affect the application of OD in the future. These are transitions in the world economy, the trend toward more diverse, educated, and contingent workforces, the increasing use of ICT, and the trend toward more networked knowledge and learningbased innovation-based organizations. It can be seen that the contextual environment of OD is fluid. Globalization, sustainable development, ecology, education, family life, the role of women, and social protection are all examples of factors that impact upon modern-day organizations and hence upon the practice of OD. In view of these contextual changes, it would be surprising if today's OD was the same as the OD of the 1950s. Taking the example of globalization, it is reasonable to question whether techniques such as T-group training, even if they were shown to be effective in countries such as the United States and the United Kingdom, could be used in the same way in countries such as India, Nigeria, and Russia. In the following sections of this chapter, certain aspects of the way in which OD has developed are considered further.

The Changing Values and Practice of OD Practitioners

In the early 1990s, a group of researchers set out to discover "what OD practitioners believe" (Van Eynde et al., 1992). One of the main conclusions that they drew from the results of their survey of 290 OD practitioners was that modern-day OD practitioners have tended to add a degree of bottom-line pragmatism (e.g., profit-related considerations) to their activities. The explanations offered by these authors for this shift in focus are highly relevant to this discussion. Van Eynde et al. suggest that some early OD practitioners may have cared little about an organization's well-being as long as they were helping the employees. Further, many of these early OD practitioners struggled to convince managers that human factors, such as quality of working life, were impacting on the profitability of organizations. As the years went by, this apparent lack of relevance of OD to business practices became increasingly cited as OD's major deficiency. Further, the introduction of private-sector business practices relating to accountability and value for money in public-sector organizations merely exacerbated the problem. OD theorists and practitioners were called upon to justify the relevance of their work to business objectives. Worren, Ruddle, and Moore (1999) observe that OD practitioners, who had thought about people all along, had to concede that they had forgotten about markets, strategies, and computers. As a result, there was a move within OD circles to become more business focused.

While there undoubtedly remain influential proponents of traditional OD who continue to promote the humanistic values associated with early writers in the field, others have sought to introduce a more output-driven business-centered focus to OD partly in response to criticisms that traditional OD lacks a strategic business focus. For example, the author of one recent textbook on OD cites the American Society for Training and Development's definition of OD that now proposes that the practice of OD must be in alignment with organization and business objectives (McLean, 2007).

This reference to organization and business objectives is complementary to approaches have recently been advocated in some OD literature. For example, in the latest edition of their textbook on organization change and development, Cummings and Worley (2005) point out that the chapter previously entitled "Strategic Change" has been thoroughly revised and renamed as "Competitive and Collaborative Strategies." It is the view of these authors that effective OD, from this newer performance perspective, relies as much on knowledge about organization theory and economics as it does on the behavioral sciences. This acknowledgement is supported by the fact that mainstream business and management processes and techniques such as total quality management, business process reenginnering and outsourcing are now presented in some OD literature as potentially useful technologies that

can be applied within organizations by OD professionals (McLean, 2007).

Despite falling under the label of OD interventions, however, the goals of a business-focused OD intervention are likely to be different from the goals of a humanistically driven OD intervention. This raises serious issues about who is the client in an OD intervention. If an OD intervention is undertaken primarily for social reasons, the OD practitioner is likely to take a multistakeholder perspective and the clients of the intervention will include everyone within the organization and perhaps extend further to, for example, members of the local community in which the organization operates. If, on the other hand, an OD intervention is primarily business focused, OD practitioners may well perceive themselves to be agents of the management of the organization and will, as such, actively and chiefly promote the interests and values of management. It can be seen that the issue of who is the client becomes of vital importance when OD interventions are evaluated. For example, the top management of an organization may expect an OD intervention to be evaluated against one set of criteria while more junior employees may prefer to use an entirely different set of criteria against which to measure the merits or otherwise of the same intervention. Hubbell (2004) notes that there is currently no consensus among those writers in the field of OD who address this issue, with some arguing that the leader of the organization is the client and others identifying the entire organization as the client.

The evolving nature of OD previously discussed has created implications for those involved in the field. Perhaps most fundamentally, it raises the question of whether or not OD now has a distinct identity. Schifo (2004) concludes his paper on the specific subject of defining today's OD by stating that although there have been numerous attempts to accurately define OD, few have done so with just enough precision to create a pattern recognizable as OD. Traditionally, at least, OD was seen as a distinct approach to change management that was based on humanistic values. Now the position is unclear. For example, Beitler (2005) has gone as far as to declare that humanistically based OD is dead. While this is an extreme position, the long-term evolutionary process through which OD is passing raises serious ambiguities about its current nature and, as a result, how it can be defined or characterized accurately. This ambiguity and concern is recognized within the field itself with writers suggesting that OD as a brand is in dire straits (Weidner, 2004).

Another implication of the current ambiguity surrounding OD and its values is that it allows the phrase "OD consultant" to be used permissively and with impunity by any change-management consultant. Thus, there are those who, rather than espousing the humanistic values previoulsy outlined, see the phrase OD as a useful hook from which to hang their more general approaches to change management. As Weidner (2004) points out, there is no certification

system whereby the credentials of OD practitioners can be validated. In fact, people can say that they practice OD no matter what their levels of knowledge or personal values. The nontraditional use of the phrase OD by general change-management practitioners has implications in terms of the application of OD techniques and the organization of OD practitioners within applied settings. For example, the convergence that has recently been reported between activities and processes of OD, HRM, and HRD (Ruona & Gibson, 2004) noted previously could be explained partly by the nontraditional use of the phrase OD by changemanagement practitioners. It seems reasonable to hypothesize that many of today's internal OD practitioners have become buried within the HR function (Burke, 2004), because they are really HR consultants rather than OD consultants with a distinct set of beliefs and practices that distinguish them from HR practitioners. In belief and practice, many of these OD practitioners may be more sympathetic toward the philosophy and values of the free market that underpins HRM, than toward the philosophy and values which underpin traditional OD.

SUMMARY

This chapter has explored the nature, history, and development of OD. Further, specific challenges currently facing those in the field of OD have been highlighted with a view to assessing how OD specialists themselves are seeking to address these challenges. It would be inaccurate to conclude that this analysis is overly pessimistic as to the future viability of OD. However, the analysis does lead to the conclusion that the implications of OD's current identity crisis are serious and will have to be addressed if the term OD is not to fall further from grace (Varney, 2005).

A key point emerging from this discussion is whether traditional OD is compatible with the goals of marketdriven business organizations. One hypothesis is that the lack of long-term impact of techniques such as T-group training and Grid OD is attributable to incongruity between organizational activities intended to maximize financial returns and OD interventions designed to promote humanistic philosophy and practices. There is little evidence to suggest that this question is attracting serious consideration within the field of OD. There is a also viewpoint which suggests that, at the point OD became more performance and profit orientated (Church, Burke, & Van Eynde, 1994), OD ceased to be OD in the traditional sense. The wide-scale acceptance and adoption of Grid OD and Blake and Mouton's Managerial Grid by OD practitioners may partly explain OD's current identity crisis.

At a practical level, there appears to be a general acceptance that the phrase OD is being used by a wide variety of change-management consultants. Many of these consultants may be unaware of the roots and traditions of traditional OD. As noted previously, this has led to calls for an ac-

creditation system for OD practitioners. Nevertheless, the establishment of a credible accreditation system for OD practitioners would require those in the field to agree upon the values, goals, technologies, and competencies that together make OD distinct from other approaches to change management. In order to be effective, it would also require publicity among potential clients and perhaps, uncomfortably for some within the field, sanction mechanisms that operate in cases where the behavior of an OD consultant is shown to be at odds with, for example, the accredited values of OD.

Finally, this chapter has highlighted and discussed some implications of the ambiguities that currently surround OD. Whatever its current state, OD was founded upon a philosophy that espoused certain moral values. The word "moral" has been deliberately introduced at the close of the chapter to make a wider point; that is, the contextual trends that have been highlighted in this chapter point to changes occurring at societal levels about morality. In the Western world, these changes are clearly evident in various domains such as legislation and attitudes toward family life, personal relationships, and religion. Over time, these changing views about morality would inevitably present a challenge to movements and philosophies that had adopted a stated value-based position about people and the way that they should interact. The ultimate challenge for those in the field of OD is to decide whether these original values are negotiable and relative to the contexts in which practitioners find themselves or whether these values are absolute, universal and time resistant. If the former stance is adopted, questions about the ambiguous nature and values of OD will remain though its various manifestations may become widely embraced in a wide variety of organizations and international settings. The evolution of OD from Lewin's humanistic perspective to a new more general change-management profession (Worren, Ruddle, & Moore, 1999) will have been achieved. If the latter stance is adopted, the identity crisis facing OD will have been addressed though the popularity of OD may rise and wane, as its values complement or challenge the dominant values prevalent in certain but not necessarily all contexts in which it is practiced.

REFERENCES AND FURTHER READINGS

Beckhard, R. (1969). Organization development: Strategies and models. Boston: Addison Wesley.

Beitler, M. (2005). *Strategic organizational learning: A practitioner's guide for managers and consultants*. Washington, DC: Practitioner Press International.

Blake, R. S., Mouton, J. S., Barnes, L., & Greiner, L. (1964, November/December). Breakthrough in organization development. *Harvard Business Review*, 133–155.

Blake, R. S., & Mouton, J. S. (1985). *The managerial grid.* Houston, TX: Gulf Publishing.

Burke, W. W. (1994). Organization development: A process of learning and changing (2nd ed.). Boston: Addison Wesley.

- Burke, W. W. (2004). Internal organization development practitioners: Where do they belong? *The Journal of Applied Behavioral Sciences*, 40(4), 423–431.
- Burnes, B. (2004). Kurt Lewin and the planned approach to change: A reappraisal. *Journal of Management Studies*, 41(6), 977–1002.
- Church A. H., Burke, W. W., & Van Eynde, D. F. (1994). Values, motives and interventions of organisation development practitioners. *Group and Organization Management*, 19(1), 5–50.
- Cooperrider, D. L., & Srivastva, S. (1987). Appreciative inquiry in organizational life. In R. W. Woodman & W. A. Pasmore (Eds.), *Research in organizational change and development* (Vol. 1, pp. 129–169). Greenwich, CT: JAI Press.
- Cummings, T., & Worley, C. (2005). *Organization development and change* (8th ed.). Mason, OH: Thomson.
- Deaner, C. M. D. (1994). A model of organization development ethics. *Public Administration Quarterly*, 17(4), 435–446.
- Egan, T. M. (2002). Organization development: an examination of definitions and dependent variables. *Organization Development Journal*, 20(2), 59–69.
- Fredericks, J., & Stewart, J. (1996). The strategy-HRD connection. In J. Stewart & J. McGoldrick (Eds.), *Human resource development: Perspectives, strategies and practice* (pp. 101–119). London: Pitman.
- French, W., & Bell, C. (1999). Organization development: Behavioural science interventions for organization improvement (6th ed.). Englewood Cliffs, NJ: Prentice Hall.
- Grieves, J. (2000). Images of change. *Journal of Management Development*, 19(5), 345–447.
- Harvey, D., & Brown, D. R. (2001). An experiential approach to organization development (6th ed.). Englewood Cliffs, NJ: Prentice Hall.
- Hubbell, L. (2004). Struggling with the issue of who the client is in organization development interventions. *Leadership and Organization Development Journal*, 25(5/6), 399–410.
- James, R. (2004). Exploring OD in Africa: A response to David Lewis. Nonprofit Management and Leadership, 14(3), 313–324.
- Maslow, A. H. (1954). *Motivation and human personality*. New York: Harper and Row
- Massarick, F. (1990). Chaos and change: Examining the aesthetics of organization development. In F. Massarick (Ed.), *Advances in organization development* (Vol. 1, pp. 1–10). Norwood, NJ: Ablex.
- McKenna, E. (2000). Business psychology and organisational behaviour (3rd ed.). East Sussex, UK: Psychology Press.

- McLean, G. N. (2007). Organization development: Principles, processes, performance. San Francisco: Berrett-Koehler.
- Mozenter, J. (2002). Recent research links: Macro forces, emerging trends and OD's expanding role. *Organization Development Journal*, 20(2), 48–57.
- Organization Development Institute. (1991). *The international organization development code of ethics*. Retrieved September 12, 2007, from http://members.aol.com/odinst/ethics.htm
- Perlaki, I. (1994). Organizational development in Eastern Europe: Learning to build culture-specific OD theories. *The Journal of Applied Behavioral Science*, 30(3), 297–312.
- Piotrowski, C., & Armstrong, T. R. (2005). Major research areas in organization development. *Organization Development Jour*nal, 23(4), 86–91.
- Rao, T. V., & Vijayalakshmi, M. (2000). Organization development in India. Organization Development Journal, 18(1), 51–63.
- Rees, C. J., & Sharifi S. (2002). Organisation development: From beliefs to practice. *Zagreb International Review of Economics and Business*, 5, 109–122.
- Rogers, C. (1969). Freedom to learn: studies of the person. Columbus, OH: Charles Merrill
- Rollinson, D., Broadfield, A., & Edwards, D. J. (1998). *Organisational behaviour and analysis: An integrated approach*. Harlow, UK: Addison Wesley Longman.
- Ruona, W. E., & Gibson, S. K. (2004). The making of twenty-first century HR: An analysis of the convergence of HRM, HRD and OD. *Human Resource Management*, 43(1), 49–66.
- Schein, E. H. (1990). Back to the future: Recapturing the OD vision. In F. Massarick (Ed.), *Advances in organization development* (Vol. 1, pp. 13–26). Norwood, NJ: Ablex.
- Schifo, R. (2004). OD in ten words or less: Adding lightness to the definitions of organizational development. *Organization Development Journal*, 22(3), 74–85.
- Senior, B. (1997). Organisational change. London: Prentice Hall.
 Van Eynde, D. F., Church, A., Hurley, R. F., & Burke, W. W. (1992). What OD practitioners believe. Training and Development, 46(4), 41–44.
- Varney, G. H. (2005). Challenges facing the field of organization development: An academic perspective. *Seasonings*, 1(3).
- Weidner, C. K., II. (2004). A brand in dire straits: Organization development at sixty. Organization Development Journal, 22(2), 37–47.
- Worren, N. A. M., Ruddle, K., & Moore, K. (1999). From organizational development to change management: The emergence of a new profession. *The Journal of Applied Behavioral Science*, 35(3), 273–285.

THE STATE OF ORGANIZATION DEVELOPMENT

DAVID L. BRADFORD

Stanford University

W. WARNER BURKE

Columbia University

oday's leadership is basically about change. Developing technologies and emerging markets demand that executives be able to anticipate new directions and opportunities. This requires not only producing change, but also managing the turbulence that results. Organization development (OD) is about change and has the twin goals of planning and executing successful change while also increasing the organization's competence to handle future change.

This should produce an alignment of goals where leaders would welcome the wisdom and competence that OD professionals bring. Yet, as observed in our recent book, *Reinventing Organization Development* (Bradford & Burke, 2005), very few executives use (or may even be aware of) OD. Instead, they rely heavily on the major consulting firms. Why are the latter at the executive table while OD is largely ignored or relegated to the bowels of the organization often within the human resources function? We asked a dozen of the present and past leaders in the field to comment on this paradox. While their individual answers differed to some degree, many questioned whether the practice of OD truly spoke to the needs of most leaders.

In this chapter, we will not review the specific arguments in this book (but urge readers to do so on their own), and instead, take the discussion further to understand this paradox. Our arguments will be built around three definitions of OD: (a) the espoused definition; (b) how it is defined when we look at the field in practice, and (c) how it needs to be

defined if it is to be widely valued by executives. We will suggest that much of the present difficulty with OD is not only the contradiction between the first two definitions, but also problems embedded within these two definitions.

THE ESPOUSED DEFINITION OF OD

Burke (in press) reviewed several of the formal definitions and concluded that most practitioners in the field would likely include in their definitions that OD is (a) planned, (b) a long-term process, (c) based on commonly held values (especially the value of participation), (d) based on a systems perspective, and (e) essentially about change and development with reliance on the application of the behavioral sciences.

The general model of intervention is one of initial diagnosis (often involving quantitative as well as qualitative data collection), followed by analysis, meaning a summary of what the data indicate, plus the use of a framework or model. The purposes of using some framework or model are to provide (a) conceptual meaning, (b) a systems perspective, and (c) an evidence-based and documented basis for action. Once the analysis of the data is complete, feedback to the client organization follows. Often this leads to joint planning as to the nature of the intervention (often with those impacted by the change effort). Action that initiates change in the organization is the final step in this sequence.

As we now know only too well, there are some difficulties with this nice, neat sequence. It is a sequence that is logical and, in principle, should be followed, but two realities must be taken into account.

First, as previously noted (Burke, 2008), we plan change in a linear manner—steps or phases in sequence—yet the implementation of organization change and development does not occur in a linear fashion. The initiation of change in a system has consequences, most of which are not anticipated. Thus, managing change is mostly about dealing with unanticipated consequences to actions taken.

Second, most OD consultants who enter a system to help initiate change discover that change is not only already underway, but also has been for quite some time and things are a mess. Using a modern-day baseball metaphor of "It's the sixth inning and our team is in jeopardy of losing the game" may help to illustrate.

In today's professional baseball, especially in the major leagues, a pitcher rarely pitches for all nine innings. Teams today have a large bullpen. While the facts might prove otherwise, it seems as though our starting pitcher often gets into trouble around the fifth or sixth inning. There are no outs, with two men on base, and our pitcher cannot seem to find the plate. The manager calls time out, walks to the mound, and signals for a replacement from the bullpen. Our relief pitcher is now faced with a very tough situation yet is expected to save the day. It is a lot like that for OD practitioners today. They enter the scene and find that many attempts to bring about change have been undertaken, yet chaos reigns, organizational members are frustrated, there are pleas for structure, not to mention leadership, and our OD consultants are expected to turn things around, to save the day—and to do this quickly without the luxury of a full diagnosis or extensive joint planning.

The difficulty is that our formal definitions of OD envision change as a discrete, episodic event with a clear beginning, middle, and ending. However, as noted previously, few consultants have the luxury of starting completely new in the first inning. Yet considering organization change as either continuous or discontinuous remains useful since different interventions are required for each of the two forms (Burke, 2008). In fact, in a recent review of the literature on organization change and development, Weick and Quinn (1999) organized their chapter accordingly considering studies on both episodic and continuous change. They also addressed Lewin's three-stage model of "unfreezechange—refreeze." It may be that Lewin's earlier thinking is not irrelevant for today's world of organization change but simply needs to be considered somewhat differently. Even in a situation of continuous change, episodic change of a perturbation or jolt to the system may be necessary and therefore where one begins (Tushman & Romanelli, 1985). And for continuous change to be successful, perhaps it is more like "freeze-rebalance-unfreeze."

By way of clarification as to what Weick and Quinn (1999) meant, to *freeze* continuous change is to find the patterns in day-to-day life in the organizations and to re-

inforce them. To *rebalance* is to change the patterns so that fewer restraints and barriers are present and the continuous change can flow more freely. To *unfreeze* after the rebalancing is to innovate and find new ways of ensuring continuous change. These new ways evolve from habits of continuing to look for means of improving the manner in which work gets done and of continuing to strengthen the critical interdependencies of organization members (Burke, 2008).

Another problem with our espoused definitions of OD arises out of the belief in participation. The benefit of involving those affected by the change rests on two key assumptions. First, this assumes that there is goal congruence between those needing to produce change and those being affected. Second, there is crucial information and expertise held by those affected and that utilizing that knowledge will make the change effort more effective and efficient.

It is likely that evolutionary change will meet the two assumptions that underlie the value of participation, but even in organizations where change is continuous, there still are occasions when there is a dramatic disconnect. An entirely new technology emerges that requires fundamentally different competences than held by the present workforce. Will participation be an asset or a hindrance to successful adaptation? Furthermore, we would argue that fundamental change often involves an incompatibility of goals and demands expertise not held by the present members. If the same change sequence can be both evolutionary and revolutionary, then it raises the question at what parts of the change effort is participation useful or counterproductive?

OD DEFINED IN PRACTICE

We have considered OD as defined in books and articles. Now let us address how OD is defined in practice. In a recent international study of OD practice, Fagenson-Eland, Ensher, and Burke (2004) found that the top four practices were training and development, team building, performance appraisal and reward systems, and organization structural change. The number one practice, training and development, concerns the individual, number two, the group level, and the other two touch on some aspect of the larger organization. With respect to practice, then, these data indicate that OD remains linked to its past. The early days of the field (1960s) was predominantly about training, individual development, and team building. While the range of OD practice today spans all organizational levels, it looks as though the primary levels of emphasis remain individual and group.

Thus, if we look at what OD practitioners actually do, three characteristics stand out.

 The focus is almost exclusively at the individual, interpersonal, or team level. Sometimes it involves intergroup issues and even more rarely an intact unit (or the entire company if quite small). It is not a systemic intervention.

- 2. There is a dearth of OD consulting firms. Most work is done by individuals or a couple of colleagues in partnership.
- Humanistic values, not findings from the applied behavioral sciences, underlie many of the decisions being made.

These three characteristics pose a series of problems. In terms of the first, while many OD consultants would claim that they take a systems viewpoint, this turns out not to be the case in practice. Taking a systems viewpoint demands that one deals with (not just acknowledges) all parts of the system that are relevant. This not only includes structure and systems (e.g., IT, financial, performance management systems), but also the product or service of the organization, its strategy, and the market niche in which it operates. In other words, effective organization change needs to involve what an organization does and how the organization works and not just the interpersonal and team influence and decision-making processes.

This point speaks to another complication. OD consultants frequently make the assumption that if one improves individual, interpersonal, and team performance, those improvements will necessarily increase organizational performance, but this is crossing levels of analysis. It is possible for aware and developed individuals to be part of a dysfunctional team (and vice versa). Also, one can have a well-working team (or subunit) without that leading to an effective organization. Improvement at one level does not guarantee improvement at the other levels. As Richard Beckhard often commented, "Where is the organization in organization development?"

If one is to take the entire organization into consideration when dealing with change, we would suggest that an individual OD consultant is an oxymoron. There is a reason why the major consulting firms such as McKinsey, BCG, Accenture, IBM Business Consulting Services, Deloite, and Oliver Wyman are large. It is not just to leverage the payment schedule from junior associates; it is recognizing that no one individual can hold all the knowledge required in producing large-scale change. Such an intervention requires competence in assessing the appropriateness of what the organization does, the market it is in, its strategy, the systems that it uses to measure and control, and how it is structured. Thus, the way that most OD consultants work structurally prevents them from being able to work at a system level. As noted earlier, OD practice today remains linked to its past. Let us briefly consider this past.

OD AND ITS PAST

OD grew from a variety of roots, but the two main ones were sensitivity training, or T-groups in the United States, and sociotechnical systems in the United Kingdom. In the United States, original OD practice emerged in the early 1960s and was primarily group based, that is, sensitivity training applied to organizations (Argyris, 1964). The work

by Herbert Shepard and Harry Kolb at Esso (now Exxon-Mobil) consisted of small-group training programs based on T-group methodology as an attempt to change managers' styles to a more participative approach. Douglas McGregor and Richard Beckhard took a similar approach at General Mills and Union Carbide. Although Eric Trist and others affiliated with the Tavistock Institute in London at the time (1950s and early 1960s) did not rely on T-group methodology, they did focus on small work teams and emphasized the importance of integrating the social component of work life with the technical side—particularly when attempting to change some aspect of technology in the workplace (coal mines and textile mills). Early OD practice, therefore, emphasized individual training and development, interpersonal sensitivity, and group dynamics.

Also, it should be noted that most of the pioneers in OD at the time were faculty members at universities across the United States (McGregor at MIT, Argyris at Yale, Shepard later at Case Western Reserve, Tannenbaum at UCLA, and French at the University of Michigan, a protégé of Kurt Lewin and developer of action research, to name a few). This aspect of history meant that OD was rooted in the academic world of the behavioral sciences. Applying this knowledge became the mantra of OD.

A gradual change in this history of OD began to occur in the late 1960s (the decade of much change at the societal level in the United States and no doubt a contextual influence on the field of OD). Humanistic psychology led by Abraham Maslow and others emerged, and the article "Values, Man, and Organizations" by Tannenbaum and Davis (1969) signaled this influence on OD. Also, university faculties became more research-based and theoretical. Today, few OD practitioners are members of academia, and as a consequence, OD has lost much of its grounding in the behavioral sciences.

THE EFFECT OF HUMANISTIC VALUES

There was a fundamental (and we would argue, deleterious) effect on the field of OD by this emphasis on humanistic values. Science describes what is, whereas values define what should be. Values are important. They help individuals make personal choices (including what clients they would want and not want to work with), and they assist organizations in setting aspirations about what they want to become. But problems arise when values are used to define present reality. Consultants need to objectively assess what works and what does not.

But such objectivity has been largely lost in the field of OD. We have heard more than one senior OD consultant proclaim that "there has been no successful change that wasn't basically participative." Such a statement defies reality (and over 5,000 years of recorded human history)! Confusing what one wishes with what is has a series of major costs.

First, it causes such consultants to lose credibility. What CEO, who has spent years making autonomous decisions

that have helped build a successful company, would invite a consultant who makes such a claim to the executive table to assist in making crucial change decisions?

Second, it severely limits the range of approaches that OD consultants use. We would argue that there are times for involvement and times when change should be imposed. There are times for transparency and times when information should be withheld. There are times to work out ways to avoid layoffs and times for quick action in reducing the workforce.

This failure to objectively assess what is occurring has a third cost. The field lacks a sophisticated theory of change. (Instead, there is a reliance on the overly simplistic model of unfreeze—change—refreeze.) An effective theory of change would have to be conditional. Under what conditions should change be imposed and when should it be collaborative? When collaborative, who should one involve and who should not be involved? What are the conditions when information should be shared and when should it be withheld?

The lack of a sophisticated and integrated theory of change has led OD to move from one technique to another. That is the point that Harvey (2005) makes, in his wickedly satirical article, "The Future of OD or Why Don't They Take the Tubes out of Grandma?" The field in the past several decades has swerved from one elixir to another, be it the Grid, quality circles, visioning, the Enneagram, and most recently, appreciative inquiry.

But probably the most damaging effect of the focus on humanistic values is that it has deflected OD from its goal of making the organization more effective. But the emphasis, as stated above, has increasingly been on the individual or the team. In fact, one has only to attend meetings of OD practitioners (or read their e-mails) to see how many are implicitly, or explicitly, in opposition to organizational goals. One rarely hears OD consultants talk about return on investment, increased profitability, growth in market share, mission and strategy, or increased stock price valuation—all concepts that are the primary concern of company executives.

This has caused the field to miss out on several of the major changes that organizations have faced. In the 1990s, U.S. corporations went through a rigorous campaign of reengineering (downsizing or rightsizing) to increase their competitive position. Accompanying that was a wave of mergers and acquisitions. OD consultants were largely absent from these ventures because both would have led to layoffs. Questions have been raised about whether full economic benefits have been achieved by such actions (Burke & Biggart, 1997). Would they have better achieved these economic benefits with the involvement of OD consultants who held the organization's financial goals? OD might have added major benefits to these efforts if those consultants did not have such a reflexive rejection of anything that might lead to layoffs.

For all these reasons, the way that the field is now practiced has largely made it irrelevant to leaders in today's

organization. But this does not mean that OD has to be this way. What we will suggest is that a new definition of OD could make it a highly relevant field so that it would have a place at the executive table.

HOW THE FIELD SHOULD BE DEFINED

Organization development is a systemwide intervention, based on the findings from the applied behavioral sciences, that seeks to achieve the dual goals of successfully completing this change effort while increasing the organization's competence to function more effectively and to better handle change in the future.

In what ways is this definition different than the initial espoused definition? By stressing that it is a systemwide intervention, not just perspective, the definition concretizes the fact that there cannot be an individual OD consultant. That person has to be part of an OD firm. This could be a boutique firm as small as one-half dozen people that focuses on a specific industry. But if the intervention has to include the relevant functional areas, no one individual can be successful in completing an OD intervention. An independent consultant might say, "I do team building, coaching, intergroup work, visioning, and other techniques that have developed from the OD field," but they cannot say, "I am an independent OD consultant."

Taking a systems approach requires the OD firm to move beyond process consultation. Presently, there is the (often implicit) attitude that one can ignore what the organization does, the technology it deals with, and the market it is in. ("It makes no difference whether we are dealing with potato chips or computer chips.") But these other factors are crucial if one is to produce an integrated change effort.

Second, this definition does not mention humanistic values. Insofar as the intervention takes account of theory and research in the applied behavioral sciences, it will use techniques of involvement, participation, transparency, and the like when that is necessary to achieve a successful outcome. OD consultants might personally hold humanistic values as the way that they want to lead their life, but they will not confuse those with scientific knowledge of what works (and under what conditions that is appropriate).

Third, the emphasis is on increasing the organization's competence so it does not make the mistake of confusing levels of analysis. While a successful intervention in Company X may require increasing individual and team capabilities, that is done, not as an end in and of itself, but when doing so would be necessary components to increased organizational effectiveness. Furthermore, it sees as primary the achievement of the organization's goals—including financial objectives as well as the value the institution produces for society.

This definition does raise the question of how the actions of an OD-based firm can be differentiated from what the major consulting firms do. Most of the latter have a practice in organizational effectiveness and would claim

that they too are basing their work on the applied behavioral sciences.

Again, we would argue that there is a difference between their espoused values and their theory in practice. There is a tendency for the major consulting firms to implement top-down imposed change with participation being used more to gain acceptance of previously determined change goals than to tap into the knowledge of the workforce. Some consulting firms have attempted to integrate OD practice with their more standard strategic work, but the integration has been problematic. McKinsey could serve as an example.

Another difference is around the transfer of competencies. Even though many of the major consulting firms espouse such transfer, there is a tendency, instead, to build dependency. Consulting firms that are based on a business model that leverages use of junior analysts require repeated engagements that use much of the same technology. Transferring those competencies to the client could be seen as limiting financial growth.

We would suggest that the OD firm has an advantage not held by the major consulting firms. The challenges with change are due as much, if not more, to issues of implementation as they are with the change objectives themselves. Many recommendations from consulting firms collect dust—or even worse—have a negative outcome to the organization. The added value from the OD firm is its expertise on the process of change (especially if it uses all the knowledge from the applied behavioral sciences). It does not matter whether our (boutique) OD firm specializes in strategy, information technology, accounting and financial systems, workflow processes, or the like, if it integrates content expertise in those areas with knowledge about the process of change.

A second advantage is that historically OD developed from research which showed that the quality of the outcome often increased when one utilized the knowledge held by those being affected by the change. Thus, participation is valued, not as a manipulative technique to gain compliance, but as a way to integrate the expertise of the change agents with the expertise embedded within the organization.

Finally, since OD places a high value on collaboration, our OD firm is better equipped to pass on its expertise to the client system. This meets the second goal of an OD intervention of increasing the organization's competence.

WILL THE FIELD OF OD CHANGE?

We concluded our book *Reinventing Organization Development* on a pessimistic note questioning whether the field will change. We felt that there were too many forces keeping it in its present state. Too many OD consultants have an emotional attachment to humanistic values to give them up for the "cooler" applied behavioral sciences. National OD meetings appear to focus more on self-congratulation than on taking a hard look at the field.

Another reason why we are not sanguine about any basic redefinition of the field is that the third definition of OD requires, not an evolutionary change, but one that is quite basic. As noted above, such fundamental change rarely occurs through a participatory process because such change usually results in significant decrease in power of key participants and/or a requirement to learn new competencies. Those are the forces that fuel resistance. In those cases, redirecting the ship on a dramatically new path usually needs an individual or small group to drive such change. But the very value of participation that underlies the humanistic values held by most OD practitioners (let alone the antiauthority tendencies of most members) decreases the chance that such change agent(s) will emerge.

Thus, we must settle on the benefits that the present practice of OD produces. Value is added through coaching, team building, visioning, and the like. These do help individuals and teams operate more effectively (at least in the short run). However, that does not allow the field to help organizations develop in the way they must if they are to survive in today's increasingly turbulent world, and they do not help the OD consultant find a place at the executive's table where the key change decisions are made.

REFERENCES AND FURTHER READINGS

- Argyris, C. (1964). T-groups for organizational effectiveness. *Harvard Business Review*, 40(2), 60–74.
- Bradford, D. L., & Burke, W. W. (Eds.). (2005). *Reinventing organization development*. San Francisco: Pfeiffer/Wiley.
- Burke, W. W. (1994). Organization development: A process of learning and changing (2nd ed.). Reading, MA: Addison-Wesley.
- Burke, W. W. (2008). A contemporary view of organization development. In T. G. Cummings (Ed.), *Handbook of organization development* (pp. 13–38). Thousand Oaks, CA: Sage.
- Burke, W. W. (2008). *Organization change: Theory and practice* (2nd ed.). Thousand Oaks, CA: Sage.
- Burke, W. W., & Biggart, N. W. (1997). Interorganizational relations. In D. Druckman, J. E. Singer, & H. Van Cott (Eds), Enhancing organizational performance (pp. 120–149). Washington, DC: National Academy Press.
- Cummings, T. G. (Ed.). (2008). *Handbook of organization development*. Thousand Oaks, CA: Sage.
- Cummings, T. G., & Worley, C. G. (2005). Organization development and change (8th ed.). Mason, OH: Thomson South-Western.
- Fagenson-Eland, E., Ensher, E. A., & Burke, W. W. (2004). Organization development and change interventions: A sevennation comparison. *Journal of Applied Behavioral Science*, 40(4), 432–464.
- Goodstein, L. D., & Burke, W. W. (1991). Creating successful organizational change. Organizational Dynamics, 19(4), 5–17.
- Harvey, J. B. (2005). The future of OD, or why don't they take the tubes out of grandma? In D. L. Bradford & W. W. Burke (Eds.), *Reinventing organization development* (pp. 15–18). San Francisco: Pfeiffer/Wiley.

- Lawler, E., III., & Worley, C. G. (2006). *Built to change: How to achieve sustained organizational effectiveness*. San Francisco: Jossey-Bass.
- O'Toole, J. (1995). Leading change: Overcoming the ideology of comfort and the tyranny of custom. San Francisco: Jossey-Bass.
- Pascale, R. T., Milleman, M., & Gioja, L. (2000). Surfing the edge of chaos: The laws of nature and the new laws of business. New York: Crown Business.
- Schein, E. H. (1988). Process consultation, Vol. 1: Its role in organization development (2nd ed.). Reading, MA: Addison-Wesley.
- Tannenbaum, R., & Davis, S. A. (1969). Values, man, and organizations. *Industrial Management Review*, 10(2), 67–83.
- Tushman, M. L., & Romanelli, E. (1985) Organizational evolution: A metamorphosis model of convergence and reorienta-

- tion. In L. L. Cummings & B. M. Staw (Eds.), *Research in organizational behavior* (Vol. 7, pp. 171–192). Greenwich, CT: JAI Press.
- Weick, K. E., & Quinn, R. E. (1999). Organizational change and development. *Annual Review of Psychology*, 50(1), 361–386.

Periodicals

Periodicals devoted to organization development are the *Organization Development Journal* and *OD Practitioner*. Periodicals with a wider scope that publish articles on organization change and development include the *Journal of Applied Behavioral Science*, *Organizational Dynamics*, and *Journal of Organizational Change Management*.

Managing Creativity and Innovation in the 21st Century

LISA K. GUNDRY

DePaul University

s organizations continually realign their activities to reach new and challenging performance goals, creativity and innovation become necessary and desirable processes that play increasingly critical roles not only to help organizations grow and prosper, but also to ensure their very survival in the 21st-century marketplace. As organizations' boundaries expand and constituents' needs change, managers are encountering problems and opportunities that are complex and that they have never before confronted. These may relate to the emergence of new global competitors across industries; the demand for new products, services, processes, and technologies; increased competition for the pool of talented employees; and the need for breakthrough solutions to persisting business and societal problems. Moreover, managers are discovering that the traditional methods and solutions that have historically been used to resolve many problems are no longer effective. With the recognition by management that different approaches and perspectives are needed to help their organizations survive and grow, the interest in managing creativity and innovation has exploded in recent years.

This chapter examines the nature of creativity and innovation in the workplace and examines how these processes can be managed in the 21st century organization. The following topics will be addressed:

• Theories of creativity and innovation: definitions, components, and how the processes are distinguished from one another

- The creative process for individuals and teams in organizations
- · Assessment of creativity
- · Obstacles to successful innovation
- Dimensions of organizational climate that influence creativity and innovation
- Managerial practices that stimulate and reinforce creativity
- Organizational strategies for successful innovation
- Future directions for managing creativity and innovation

Creative thinking and behavior leading to successful, sustainable innovations are vital in most organizations. Managers who can effectively navigate and promote these processes will enable their teams, departments, and organizations to become entrepreneurial, and thus much more nimble in anticipating and responding to market changes.

THEORY

Definitions

Creativity

Management scholars have defined creativity as the construction of novel and useful ideas, opportunities, or solutions. Amabile (1997, 1998), who proposed this definition of creativity, has written that creativity is the first step in

innovation. For an idea to be considered creative, it should be different from what has been attempted in the past, it should be of good fit to the problem it may resolve or the opportunity it may enable, and it should be actionable. Therefore, a creative idea cannot be simply original or unusual. It has to be connected to a purpose, to be appropriate to the need it is attempting to fill. Creativity is often a response to something that prompts individuals and groups to find a solution. It has been described as going beyond the existing boundaries: knowledge boundaries, technology boundaries, current industry, management practices, social norms, or beliefs. It involves seeing and acting upon new relationships and combinations.

Creativity is a process: It involves perceptions and skills that enable individuals to see things from a different perspective and then act on those observations. There are many ways that individuals can be creative in their work, and researchers have described creativity as a way in which individuals actually approach their work. It might involve developing entirely new methods and arrangements of working, new strategies for the business, and combining products, services, or job processes in new ways to produce new or greater value. These creative outcomes should be unique and different, but not bizarre or so unusual that putting them into action is impossible.

Creativity is especially suited to unstructured, new problems or opportunities. The more ill defined a problem or situation is that managers and organizations face, the more likely a creative solution will be required. Creativity is not confined to a particular profession or occupation. Traditionally, creative behaviors or pursuits were considered the realm of artists, musicians, scientists, designers, and so forth. A more contemporary view is that every function, each position in an organization, entails some degree of creative thinking and behavior. The direction in which this creativity is expressed may be different across professions and functional areas, but it is still of value to the organization. Later in the chapter, approaches to creativity that benefit from the diversity of perspectives available in organizations will be discussed, as well as creative problem-solving processes that have been developed and can be adopted by managers in organizations to assist them in solving complex challenges they face.

Innovation

Innovation is a process of taking the creative ideas and solutions generated, and selected to be most appropriate to the situation, and implementing those ideas and solutions in a way that creates new value for the organization, the industry, or the greater society in which they reside. The value can be economic, social, psychological, or aesthetic.

This view of innovation rises out of scholarship that defines it as the deliberate introduction and implementation of ideas, products, services, or technological processes designed to ultimately benefit the individual, team, organization, or wider society. In the context of business organizations, innovations can be new products or extending product lines, adding new services or levels of services, expanding markets served, offering products and services to entirely new markets, deploying new technologies, and implementing new or redesigned work processes, among others.

Innovation can be viewed as a continuum, from incremental innovation that may involve a slight adaptation of what the organization already does, all the way to revolutionary, breakthrough innovation in which something that did not exist before is introduced, sometimes enabling the organization or entire industry to leap to a new level.

Individual Creativity

Contemporary theories of creativity suggest that all individuals are able to produce creative work, at least some of the time, in one or more domains or areas. This is in contrast to earlier beliefs that creativity was a condition of birth, something that individuals inherited from their parents or other ancestors, and that it was a set of traits that was part of some individuals' personalities and not others. This distinction is important because it implies that individuals in organizations are capable of performing creative work in some area some of the time. If it is presupposed that employees can demonstrate creative thinking and behavior in some aspects of their work, then it becomes a management opportunity to identify these areas, and to build a supportive work environment in which that creativity can be demonstrated. Managers can influence the social environment in which people work, so that individuals can be encouraged to display higher levels of creative behavior more frequently.

Amabile (1997, 1998) and other researchers recognized that the social environment of the workplace was of great importance and that individual skills and motivation have an impact on the creative process. Amabile proposed the componential theory of creativity, which is comprised of three major components: expertise, creative thinking abilities, and intrinsic task motivation. The more these three components intersect, that is, that employees' skills overlap with their intrinsic motives (what they deeply care about), the higher the creativity of employees will be. The three components will be examined more closely.

Expertise

Expertise is comprised of knowledge, technical competence, and particular talents related to the work that individuals are performing. It has to do with what people know, including facts and procedures that are needed to perform work effectively. Formal schooling, career and professional development, and training provided by the organization all help employees develop areas of expertise to do their work to the best of their ability.

Creative Thinking

Identifying the cognitive style of individuals can facilitate understanding of their approach to creative thinking. An individual's cognitive style directs the person to pay attention to specific areas of knowledge and certain tasks and to reduce the extent to which the person focuses on other, similarly important, knowledge and tasks.

Cognitive style is generally thought of as a phenomenon with multiple dimensions including decision making, learning, personality, and awareness. One dimension, awareness—of people, ideas, objects, and incidents—is considered especially important to problem solving and searching for opportunities in organizations. This dimension can be conceptualized as a continuum ranging from intuitive to rational. Researchers such as Ornstein (1977) and Miner (1997) referred to these two modes of awareness that reflect the rational and intuitive sides of an individual. Intuitive individuals are likely to discover opportunities by noticing cues or signals in unfamiliar and sometimes puzzling information that is processed in a holistic manner. This can help individuals identify an opportunity and motivate them to take action. Intuition has been found to be an important thinking mode of expert idea generators.

The rational cognitive style can be described as orienting thinking to the analytic, relying on linear, sequential processing of information that allows individuals to evaluate and implement ideas or solutions. Individuals with the *rational* cognitive style may display competency in judging and evaluating information, and selecting actions to implement—skills that are needed as creative ideas are selected and put into action.

While creative thinking skills rely on some personality characteristics such as independence, risk-taking propensity, tolerance for ambiguity, perseverance, and low need for social approval, these skills can be taught through methods and techniques that enhance people's abilities to see things from different perspectives and to explore unstructured problems and situations more deeply and effectively. Studies on training of creative thinking skills have disclosed that it has a positive influence on the generation of novel and useful ideas leading to innovations.

Intrinsic Motivation

Motivation that is driven by a strong interest in the task by being involved in and challenged by the work and by curiosity and satisfaction is known as intrinsic motivation. Intrinsic motivation is more likely to lead to creative behavior and performance than extrinsic motivation. The latter is characterized by a need or desire to achieve objectives unrelated to the work itself, such as rewards (e.g., money) and other external goals. While most people are driven by some degree of both intrinsic and extrinsic motivators, intrinsic task motivation seems to influence greater creativity in the workplace. This is meaningful to managers, who can

influence task motivation through supervisory support and the social environment of the team or the organization.

Group Creativity

In the workplace, it is becoming increasingly likely that at least some of the work individuals do is performed in the context of a group or team. Early research on creativity led to the belief that groups were not likely to yield particularly creative ideas or solutions because of the dynamics of the group process (e.g., productivity losses, social pressure, etc.). Contemporary research has found that not only can groups achieve high levels of creative thinking and behavior; in fact, they can sometimes outperform individuals working alone. Further, interaction among members of groups is required in some stages of the creative process. In this age of information overload, time demands, and the changing needs of the marketplace, it is difficult for individuals working on their own to have all the knowledge, information, skills, and resources needed to generate creative ideas. Researchers such as Nijstad and Paulus (2003) contended that since creativity is a social construct, creative ideas must be evaluated and implemented by others before they can even be considered creative.

One of the most important components of group creativity is diversity. Creative collaboration relies on diversity of background, experience, education, perspective, and thinking. Functional, informational, and cognitive diversity is correlated to higher levels of group creativity and innovation. For example, Maddox and Galinsky (as cited in Yu, 2006) conducted a series of studies and found that graduate students who had lived overseas for 6 to 12 months were more likely to find innovative solutions to challenging problems and negotiations. The implication for managers is to create groups that are comprised of individuals who bring a set of distinct experiences and skills to the group. With managerial values that support and respect the divergence of views, the group will likely perform very creatively and will discover and implement solutions that probably never would have been generated if these individuals worked in isolation.

The Systems Approach to Creativity

The systems views of creativity take into account the multiple factors that influence creative performance in organizations. According to this theory, individuals are influenced by social networks including groups to which they belong, as well as other organizational, cultural, and societal variables that affect individual creativity. Scholars of the systems approach such as Csikszentmihalyi (1996), Gardner (1994, 2000), Simonton (1999), and Sternberg (1999) have referred to it as holistic. According to this theory, while creativity is still viewed as an individual phenomenon, it takes place within a particular social context rather than in a vacuum. The systems theory can be very useful to understanding creativity in organizations, because

the work environment is the context in which creative performance occurs. Managers can shape and influence the social environment, thus having an impact on creativity in the work team and organization.

THE CREATIVE PROCESS IN ORGANIZATIONS

Wallas' Four-Stage Process

The creative process for individuals, teams, and organizations has been studied intensively for over 75 years. It is concerned with the way in which creativity actually happens. Much of what we know about creativity comes from understanding the process that highly creative people go through when they get their ideas. Throughout history, artists, scientists, composers, poets, and inventors have attempted to describe their creative moments. Wallas developed one of the early descriptions of the creative process, and it is still widely used today to guide the creative process in business. Wallas (1926) suggested that creative thought includes four stages:

- a. Preparation—exploring the problem or opportunity in all directions, collecting knowledge and information from multiple perspectives
- Incubation—thinking about the problem or opportunity in a "not conscious" way, and putting it on the back burner to rest the mind
- c. Illumination—the light bulb comes on and ideas begin to flow; this is sometimes experienced as a flash of insight—a "eureka" moment
- d. Verification—testing of the idea and reducing it to its most exact form

This process is very useful for individuals and teams as they explore problems and attempt to recognize new opportunities. Individuals who are able to identify the specific stage of the creative process in which they are while solving a problem or searching for an opportunity are able to guide themselves to a more innovative solution by examining the issue from different perspectives, and allowing the issue to simmer in the background. One of the characteristics of creative individuals throughout history is their ability to use this process.

Csikszentmihalyi (1996) modified Wallas' model into three stages, renaming the Illumination stage "Insight" and segmenting the Verification stage into two parts, which he labeled "Evaluation" and "Elaboration." During the Insight stage, individuals perceive that an idea is emerging, and experience that "a-ha" moment of discovery. During Evaluation, a deliberate decision is made about whether or not the idea is worth pursuing. During Elaboration, the creative idea is put into action. Csikszentmihalyi's work has

been very useful to managers and entrepreneurs, who have adapted his model for opportunity recognition processes, and for the development of clear innovation processes to implement in their organizations.

The Osborn-Parnes Creative Problem-Solving Process

Osborn, founder of the Creative Education Foundation, studied the processes used by creative individuals, and his results challenged the assumption that only a unique few individuals can develop and produce creative ideas. Osborn pioneered the process of brainstorming, a method by which groups of people share ideas in an open and unstructured fashion, building on the ideas of one another while suspending judgment. Osborn collaborated with Parnes, and together they developed the Osborn-Parnes Creative Problem-Solving (CPS) Model.

The model, widely used in organizations, and adapted and refined by researchers over the years, is designed to help individuals and groups generate the most novel and useful ideas and solutions. It is comprised of six primary steps, each with corresponding questions and creativity tools that have emerged since the model's development, to help facilitate CPS. In his work on the application of the creative process to managerial decision making, Hughes (2003) explained the model and provided linkages to new product development processes in organizations. Here are the six steps of the Osborn-Parnes CPS model:

- a. Identify the goal, issue, or challenge. This can be done by exploring ideal scenarios, and by asking probing and provocative questions to reveal the underlying need.
- b. Collect data. This involves asking *who*, *what*, *where*, *when*, *why*, *why not*, and *how* questions to gather facts and information about the challenge.
- c. Clarify the problem. Once data have been gathered it is likely that the original problem statement needs to be reframed, given this new information. This step leads to a more specific and concise problem statement, which is very helpful to the generation of alternative ideas and solutions to solving the problem.
- d. Generate ideas. In this step, the development of many alternative ideas and solutions takes place. Creativity tools that stimulate breakthrough thinking, going "blue sky," and digging to unexpected solutions are typically used.
- e. Select and strengthen solutions. Decision criteria are selected and applied to the ideas and solutions generated. Criteria might include discussion of required resources and of whether each of the ideas has the potential to solve the problem or fill the need.
- Plan for action. A plan is developed to put the ideas and solutions selected into action.

454 • ORGANIZATION DEVELOPMENT AND CHANGE IN THE 21ST CENTURY

Hughes (2003, p. 9) integrated CPS into the management decision process, by linking the steps just described to the progression of a typical business decision process such as new product development. This helps managers adapt and apply the CPS steps to key managerial activities:

- Identify the goal or challenge: vision and goals
- Gather data: situation analysis at macro and micro levels
- Clarify the problem: opportunities, problems, subproblems, and causes
- Generate ideas: alternative solutions and resources required
- Select and strengthen solutions: evaluation of alternatives and selection
- Plan for action: action plan, implementation, and measure results

Divergence and Convergence

The CPS model includes steps for both divergence and convergence, two important behaviors for CPS to be successful. Divergent behavior includes building on the ideas of others (or one's own, since the model can be used by individuals working alone on problems or projects), identifying ways to enhance the potential of an idea, and using departures from conventional thinking (or "what is known") to reach unexpected alternatives. Convergent behavior is judging, evaluating, and selecting among alternatives suggested. It is a process of refining ideas, eliminating ideas, and applying decision criteria to the selection of ideas. Without convergence, no ideas would be implemented. Research on creativity in groups has shown that, for groups to perform effectively in the divergent process of idea generation, it is required to be open to others' thoughts and opinions. Further, during idea selection, it is necessary to employ critical thinking and constructive debate among group members leads to a better decision. Groupthink can occur when there is premature consensus to an idea, and it can result in the selection of a bad idea or ineffective solution. Therefore, both divergence and convergence are necessary elements of the CPS process.

Adapting CPS to Organizational Settings

Isaksen, Dorval, and Treffinger (2000) built on the work of Osborn and Parnes and adapted the basic CPS model. Three major components represent how the stages were actually being used in organizations: Understanding the Problem, Generating Ideas, and Planning for Action. Within each stage, divergence and convergence takes place, to enable movement to the next stage (Isaksen, 1995, p. 166).

- Component: Understanding the Problem
 - Mess Finding
 - Divergence: seeking opportunities for problem solving
 - · Convergence: establishing a broad, general goal
 - · Data Finding

- Divergence: examining many details, looking at the mess from many viewpoints
- Convergence: determining the most important data to guide problem development
- Problem Finding
- Divergence: considering the many possible problem statements
- Convergence: constructing or selecting a specific problem statement
- Component: Generating Ideas
 - Idea Finding
 - Divergence: producing many, varied, and unusual ideas
 - Convergence: identifying promising possibilities and alternatives that have interesting potential to solve the problem
- Component: Planning for Action
 - · Solution Finding
 - Divergence: developing criteria for analyzing and refining possibilities
 - Convergence: choosing criteria and applying them to select, strengthen, and support promising solutions
 - Acceptance Finding
 - Divergence: considering possible sources of assistance and resistance, and possible actions for implementation
 - Convergence: formulating a specific plan of action

Isaksen et al. (2000) described divergence and convergence as creative thinking and critical thinking, respectively. Creative thinking is described as making and communicating connections that enable people to think of many possibilities using different points of view, and generating and selecting among alternatives. Critical thinking is described as analyzing and developing possibilities to compare and contrast many ideas, improving and refining ideas, making effective decisions and judgments, and providing a solid foundation for effective action in organizations. Contemporary managers are adapting CPS, and divergent/convergent behavior processes to opportunity identification, the management of change, and many other contexts in which creative thinking and critical thinking are required for organizational success.

ASSESSMENT OF CREATIVITY

Creativity Styles: Approaches to CPS and Implications for Teams

The CPS process is most effective if it is supported by management values, attitudes, and behaviors that encourage new ideas, embrace risk, and learn from failure. However, in some organizations, conformity is stressed, and managers are not rewarded for thinking and behaving differently than others. Research on the most innovative organizations including those with the quickest and most effective new product or service development cycles and those who embrace change and experiment continually reveals that

managers seek to understand their employees' problemsolving styles and help employees understand and value one another's styles. There are several measurements of individual problem-solving styles. Two will be discussed here, as they are the most frequently used.

The Kirton Adaptor Innovator (KAI), developed by Kirton (1989), is a measure of individuals' preferred approaches to problem solving. The assumptions of the KAI are that everyone is creative, that creativity and problem solving are indistinguishable, and that an individual's style of problem solving is unchangeable. The two orientations that are measured are referred to as Innovator and Adaptor. Innovators prefer making existing situations and systems different. They enjoy unstructured problems and are particularly adept at solving such challenges as the following: What new markets might the organization enter? What new technologies should be developed or integrated into the business? How can the organization improve its competitive position? Innovators enjoy sharing unusual and sometimes wild ideas, sometimes to the consternation of their Adaptor colleagues.

Adaptors prefer making existing situations better rather than different. They are especially skilled at mapping out projects and task details including such challenges as the following: How can the costs of operations be reduced? How can the efficiency of the system be enhanced? Adaptors approach problem solving by invoking precision, conciseness, and attention to detail, which may not always be appreciated by their Innovator colleagues.

The KAI measures three dimensions of problem-solving styles:

- a. Originality: Innovators are likely to suggest ideas and solutions that seem to them to be out of the ordinary. Adaptors prefer ones that are directed closely to the challenge.
- b. *Mastery of detail*: Adaptors have a greater preference for developing and attending to details than Innovators.
- c. *Rule conformity*: Innovators prefer to question the rules; adaptors are more tolerant of them.

One of the most important implications of the KAI in the workplace is that both approaches (i.e., Innovator and Adaptor) to CPS are valuable. If a work team is comprised of only Innovators, there will likely be many unusual ideas suggested, but nothing may get done because no one wants to attend to the details of planning. Conversely, if a team has only Adaptors, there may be a lack of fresh and intriguing ideas to stimulate the discussion. The implication for managers is to assemble teams that are comprised of both Innovators and Adaptors to enable the team to be creative and to solve problems innovatively.

The Hermann Brain Dominance Instrument, developed by Herrmann (1996), who was manager of management education at General Electric, assesses four different modes of thinking. The Four Quadrant Model of Thinking Preferences includes the following:

- a. *Analytical thinking*: a preference for logical, critical, quantitative, and technical thinking
- b. *Sequential thinking: a* preference for organizing, attending to details, planning, and structuring
- c. *Interpersonal thinking:* this mode is characterized by emotional, sensory, and expressive approaches
- d. *Imaginative thinking:* a visual, intuitive, and holistic mode of thinking

Similar to the KAI, this model provides connections between thinking preferences and preferred activities. For example, analysts prefer collecting information, determining how things work, and judging based on factual criteria. Sequential thinkers prefer working from one step to another, organizing information, and implementing decisions. Interpersonal thinkers enjoy listening and expressing opinions and ideas, and motivating their colleagues to contribute ideas. Imaginative thinkers prefer to envision the big picture of a situation, challenge the rules, and creatively solve a problem. However, this model is distinctive in that it encourages what Hermann (1996) coined, "whole brain thinking," in which individuals are capable of using all four quadrants, depending on the situation, problem, or challenge they face.

The Torrance Tests of Creative Thinking have also been used by many individuals, schools, and other organizations over the past few decades to assess four areas of creativity:

- a. *Fluency* refers to the number of different ideas that can be generated in 10 minutes.
- b. *Flexibility* refers to the number of different conceptual categories into which the responses can be classified.
- c. *Originality* refers to the uniqueness of an idea (determined by statistical infrequency).
- d. *Elaboration* refers to the number of details added to an idea to embellish or explore it more fully.

These models and measures are examples of assessment tools that can be used by managers to enable and enhance team collaboration, creativity, and productivity. The presence of diverse perspectives and styles in a team promotes divergent and convergent thinking, requisite to creativity and innovation in organizations.

OBSTACLES TO SUCCESSFUL INNOVATION

Decades of research on managing organizational change and innovation have revealed a number of underlying factors that can cause innovation efforts in organizations to fail. Some of these factors include organizational structures that hinder the innovation process, management strategies that are unclear or misdirected, inadequate support systems for innovation initiatives and efforts, and lack of knowledge about how to proceed from idea generation to implementation. Here are some of the principal obstacles to innovation, according to Wycoff (2003) and other researchers:

- a. Managers do not create a culture that values and supports innovation including the encouragement of new ideas, risk taking, and resource allocation to new initiatives. The lack of well-articulated expectations and recognition for efforts and performance are pitfalls of a weak culture for innovation.
- b. Managers may fail to get commitment from other managers whose cooperation and involvement are needed. While most top managers in organizations state that they desire innovation, middle managers sometimes do not buy into the process, and thus innovation is stifled. It is important to get the involvement and commitment of all levels of management early in the process, so that they can in turn provide the unit-level support for employee creativity and innovation.
- c. Lack of a widely understood, organizationwide process—innovation must be institutionalized; it cannot exist only in the research and development (R&D) lab, for example, or for only some employees and groups. The innovation process should guide employees through the front end (creativity) to the evaluation and implementation of new ideas, products, services, technologies, and other innovations.
- d. Lack of resources allocated to innovation efforts—individuals and teams need specific skills, resources, and systems that support collaboration. If no strategic vision, time, and other resource commitments are provided, the message is that innovation is not important to the organization.
- e. Innovation projects are not connected to the organization's (or team's) strategy. Focused creativity in the context of a well-articulated organizational strategy works best. Managers can direct employee thinking and efforts toward a purpose.
- f. Insufficient time is spent on creativity at the front end of innovation. Managers can adopt the CPS process to ensure employees have taken the time to identify the correct problem, to gather data from multiple points of view, and to generate as many alternatives as possible. Rushing employees through stages or activities shortchanges the innovation process, and outcomes are likely to be unsatisfactory to both employees and customers.
- g. Lack of sufficient diversity in the process—as discussed earlier, the more diversity that exists in cross-functional teams and other groups, the more people will be able to deliberately focus diverse thinking styles, experiences, skills, and perspectives on a challenging problem or opportunity, and derive a more innovative solution.
- Lack of criteria and metrics for measuring innovation success—since more ideas will be generated than can be implemented, criteria should be developed and available

in advance that will help people choose among the ideas. Some common and useful methods are PMI (the pluses and minuses of the idea, and what is interesting about the idea or solution); and ALUO (advantages, limitations, uniqueness, and opportunities inherent in the idea or solution). These are easy to implement, and the methods remove selection biases such as the power or political position of the idea generator, interdepartmental conflicts, and other irrelevant criteria. Benchmarking innovation success to other organizations is crucial, using metrics such as the number of products or services introduced within a specified period of time, the nature of the new product development cycle, the effectiveness of an idea collection system, and the number and quality of interactions among employees, customers, and other constituents that led to new ideas and solutions.

- i. No training or coaching of innovation teams—creativity and innovation skills can be taught. Managers should not assume that the skills required for these processes are the same as for other work expectations and assignments. Individuals and teams can be taught approaches and tools such as why diagramming for problem diagnosis, mind mapping, lateral thinking, and others to assist them in problem identification and idea generation for alternatives and solutions.
- j. Lack of an idea management system—organizations need a system that collects and disseminates ideas that are generated. Robinson and Schroeder (2004) conducted research that has contributed to the development of guidelines to help managers establish successful idea management systems:
 - Involve employees throughout the organization, not just in certain areas. Each suggestion should receive a response, indicating whether it will be implemented, and if not, why not? If individuals are permitted to follow the progress of their ideas through evaluation, their sense of ownership will be enhanced and they are likely to be motivated to continue contributing ideas.
 - Managers do not need to evaluate each idea. Instead, appoint or ask for volunteer evaluators who are experts in key areas of the business. Suggestions can then be sent directly to the experts to provide the feedback, or if preferred, a centralized collection system can disseminate ideas to areas of expertise in the organization.
 - Should management reward all ideas or all implemented ideas? Most scholars and practitioners agree that small rewards that are symbolic in nature (e.g., recognition, acknowledgement, logos, etc.) provide greater reinforcement of the desired behaviors than do monetary rewards. The system should primarily reward the employee's initiative, and mention rewards only secondarily.

Managers have a wide range of idea collection systems to choose from, including software systems that capture ideas and allow employees throughout the organization to build on one another's ideas. These systems can be powerful means of capitalizing on employee creativity, while increasing work satisfaction and employee engagement.

DIMENSIONS OF ORGANIZATIONAL CLIMATE THAT INFLUENCE CREATIVITY AND INNOVATION

The Climate for Innovation

Researchers have studied the dimensions of the work environment that seem to have the greatest influence on creativity and innovation. Organizational climate, the way it feels to be a member of the organization, reflects the attitudes and reactions of employees to what the organization expects and values. Ekvall (1987), of the University of Lund in Sweden, pioneered the research that examined the work environment for creativity and innovation, and he identified 10 dimensions of the organizational climate. These were later refined by Isaksen (1995), of the Center for Creative Studies at the State University of New York at Buffalo, with a focus on 9 dimensions that were measured by the Climate for Innovation Questionnaire. The 9 dimensions are summarized in the following, with explanation of how each dimension strengthens the climate for innovation and of how its absence affects the climate. Note that one of the dimensions (conflict) is inversely correlated with the climate for innovation.

Challenge and Involvement

Challenge and involvement refers to the degree to which people are involved in daily operations and long-term goals. The climate inspires and energizes members of the organization. Employees feel engaged and find meaning in their work, and are intrinsically motivated to perform at high levels. Without challenge and involvement, employees feel indifferent and apathetic.

Freedom

Autonomy is given to members to define and carry out their work. Employees take the initiative in pursuing assignments. Without freedom to do their work the way they feel best accomplishes the goals, strict guidelines exist, roles are prescribed, and there is little possibility to define the tasks.

Trust and Openness

People can be open and honest with each other, there is mutual respect, and they feel emotional safety in work relationships. Where trust is lacking, employees are suspicious of one another, they keep their feelings and opinions closely guarded, and there is a lack of open communication.

Idea Time

There is time to explore and elaborate on ideas, permitting employees to go beyond the formal task assignment and consider possibilities. If there is no slack time, employees feel time pressure and do not pursue interesting ideas.

Playfulness and Humor

An environment in which employees can be spontaneous, feel relaxed, laugh, and have fun is likely to spark new ideas. Without these, the atmosphere is serious and gloomy.

Conflicts

This dimension is inversely correlated with the climate for innovation. Employees feel tension; disagreements and power struggles persist, sometimes to the point of interdepartmental "warfare." Where conflict is managed and kept to a minimum, employees respect differences and do not let them get in the way of work goals.

Idea Support

New ideas are treated with interest and attention, and are encouraged. Feedback is constructive. Without idea support, the automatic *no* prevails. Feedback is destructive and discouraging, leading to fewer ideas generated.

Dehates

There is the opportunity for discussion of opposing views and sharing diverse perspectives. If debates are suppressed, the climate is authoritarian. Employees do not question anything, and groupthink is likely to emerge that leads to poor, if not disastrous, decisions.

Risk Taking

There is tolerance of uncertainty and ambiguity, and managers are not averse to undertaking bold new initiatives, even if the results are unclear. If risk taking is discouraged, people become cautious and make only "safe" decisions.

Ekvall (1987) grouped the dimensions into three areas: resources, motivation, and exploration. The Resources area includes idea time, idea support, and challenge and involvement. Motivation includes trust and openness, playfulness and humor, and the absence of interpersonal conflicts. Exploration includes risk taking, debates about the issues, and freedom. Ekvall tested his model of the work climate for innovation on a representative sample of 27 different organizations that were divided into innovative (8), stagnated (4), and average (15). Innovative characterized firms who were capable of developing new products and services speedily, delivering them to the market more efficiently, and whose products reached high commercial success. Stagnated described firms that were unable to effectively develop and produce new products, and the products were not as successful. The innovative group of organizations scored highest on all dimensions of climate except conflict, and the stagnated group scored lowest on all except conflict. Interestingly, the dimension of risktaking accounts for the greatest difference between the innovative and stagnated organizations. Further, freedom and debates play an important difference between climates that support radical innovation versus those that support incremental improvements. These results correlate closely with studies undertaken in other countries including the United States.

MANAGERIAL PRACTICES THAT STIMULATE AND REINFORCE CREATIVITY

KEYS: Assessment of Managerial Practices for Creativity

The KEYS Assessment of the Climate for Creativity assesses the management practices that support creativity and innovation. Developed by Amabile (1997, 1998) for the Center for Creative Leadership, it assesses perceived stimulants and obstacles to creativity in the work environment. The items on the KEYS form eight environment scales (six stimulants and two obstacles to creativity) and two outcome scales (creativity and productivity in the work). According to the Center for Creative Leadership, the following six scales measure management practices that support the work environment for creativity:

- a. Organizational encouragement. An organizational culture that encourages creativity through the fair, constructive judgment of ideas, reward and recognition for creative work, mechanisms for developing new ideas, an active flow of ideas, and a shared vision
- Supervisory encouragement. A supervisor who serves as a good work model, sets goals appropriately, supports the work group, values individual contributions, and shows confidence in the work group
- c. Work group supports. A diversely skilled work group in which people communicate well, are open to new ideas, constructively challenge each other's work, trust and help each other, and feel committed to the work they are doing
- d. *Sufficient resources*. Access to appropriate resources including funds, materials, facilities, and information
- e. *Challenging work*. A sense of having to work hard on challenging tasks and important projects
- f. Freedom. Deciding what work to do or how to do it; a sense of control over one's work

The KEYS measures the two scales of management practices that inhibit creativity:

 a. Organizational impediments. An organizational culture that impedes creativity through internal political problems, harsh criticism of new ideas, destructive internal competition, an avoidance of risk, and an overemphasis on the status quo b. *Unrealistic workload pressure*. Extreme time pressures, unrealistic expectations for productivity, and distractions from creative work

The KEYS also measures productivity (efficiency, effectiveness, and productivity of the organization or unit) and creativity (where a great deal of creativity is required, and where people can actually produce creative work).

The previously described models of the work environment for creativity have led to the emergence of several key management practices that matter most in supporting organizational creativity and innovation. These practices can be categorized into six general areas: challenge, freedom, resources, work group features, supervisory encouragement, and organizational support. As we have seen, there are some key managerial approaches and behaviors associated with successful innovation. Build and sustain a culture that supports creativity and innovation. Recognize and reward idea champions. Clearly articulate the innovation process from idea to launch. Foster open communication among employees across functions and levels, and reduce barriers of hierarchy and structure. Embrace risk, and invest in innovation projects. Celebrate experimentation, and learn from, rather than punish, failure.

ORGANIZATIONAL STRATEGIES FOR SUCCESSFUL INNOVATION

One of the myths of innovation is that valuable innovations are always revolutionary. In fact, most innovations in organizations are derived from incremental or evolutionary changes. Incremental innovation involves taking an idea that is already in existence such as product, service, distribution method, process, and so forth, and adapting it to bring new value to the customers. These may be a series of small changes to what the organization produces or distributes. Evolutionary innovations involve taking existing ideas and building on them in entirely new ways such as offering a way to do something better (or quicker, cheaper, or with more choices) than it is done presently or for different market segments. Revolutionary innovations reject existing ideas and present a way to do things that is radically different. Revolutionary strategies are often breakthrough in nature. However, very few organizations have implemented revolutionary strategies because of the risk and the resource commitments required. Hickman and Raia (2002) proposed four distinct innovation strategies for organizations that have unique advantages and structural requirements.

Improving Core Business

This strategy involves the development of incremental improvements to core products and services that can be rapidly developed and produced inexpensively. The advantages of this strategy are speedy execution, since "new and

improved" changes to the organization's offerings can be done quickly. Further, competitors often do not notice small changes, and they can add great value to the overall product or service experience. However, a disadvantage is that the incremental improvement may be an inadequate response to environmental changes (i.e., too little, too late). To implement this strategy, innovation supports that encourage these types of improvements are necessary.

Exploiting Strategic Advantages

This strategy moves the firm's innovation focus beyond its current strategic scope. It enables managers to leverage a unique brand and expand to reach a broader range of customers. Its advantage is a relatively low-risk investment for potential high return. A key disadvantage is this type of innovation could be easily duplicated by competitors. To support this strategy, managers may need to acquire external resources such as consultants, researchers, or advertising agencies.

Developing New Capabilities

This strategy involves developing or acquiring new technologies, competencies, services, and businesses to serve the current strategic scope better. Major advantages of this strategy include builds and sustaining long-term customer loyalty. However, it requires a much higher investment and execution time. To deploy this strategy, managers must create a structure that is highly flexible and permits boundary crossing including joint ventures, strategic alliances, and licensing.

Creating Revolutionary Change

This strategy involves going far beyond the organization's current product and service lines to achieve fundamental changes to the strategic scope. Using this strategy, the organization envisions new business models, new markets, and new industries. The advantages of this strategy are that the organization becomes known as a "first mover" and "groundbreaker." Weaknesses include a lack of urgency, since the organization is likely way ahead of market needs, and there is a high risk of imminent failure. Managers who select this strategy use virtual teams and alliances.

These innovation strategies help managers carry out the organizationwide vision. The selection of the appropriate strategy, and building the organizational structure that supports it, is more likely to lead to successful innovation.

FUTURE DIRECTIONS FOR MANAGING CREATIVITY AND INNOVATION

As creativity and innovation processes come to play even greater strategic roles in organizations, it is vital for managers to identify desired innovation goals and to promote creative thinking and behavior within a supportive work environment. As the field moves forward, here are some areas of significance to managers in the 21st century.

- Managers are a key influence on the work culture, and they can powerfully encourage, or inhibit, employees' creative behavior. As flexible work arrangements increase, and managers supervise employees and teams in multiple, and even remote locations, managerial practices that harness diverse perspectives inside and outside the organization, and apply them to increasingly challenging business problems will become crucial.
- The development of an innovation strategy that is aligned with resources and rewards available in the organization is a key part of the process of managing innovation. Most organizations can implement incremental strategies, few can develop revolutionary strategies; the point is to articulate the strategy to employees and provide the mechanisms to achieve the goal.
- Recently, researchers have begun to uncover relationships between creativity and the way people feel at work, to their emotion or affect. Amabile and her colleagues (e.g., Amabile, Barsade, Mueller, & Staw, 2005; Amabile, Conti, Coon, Lazenby, & Herron, 1996) found that positive reactions can stimulate creative thinking. Fong (2006) found that emotional ambivalence, the experience of positive and negative emotions at the same time, made people more sensitive to unusual relationships between concepts, an ability that is important to organizational creativity. What this means for managers in terms of their influence on employees' emotions, and whether it increases or reduces creative behavior, is likely to be explored further and in greater depth as the field moves forward.
- Organizations and workplaces are likely to become even more diverse, reflecting populations and the growth of strategic alliances across occupational, cultural, and national boundaries. Managing diverse teams and organizations is quickly becoming a valuable managerial skill that powerfully stimulates creativity and innovation.

SUMMARY

The management of creativity and innovation is one of the most essential activities in organizations today. Building and reinforcing a work environment that encourages employees to think about the new and complex challenges and opportunities facing the organization are becoming key management competencies. Models and methods managers can use to assess and stimulate creativity and to facilitate innovative performance by diverse work teams have been discussed. Researchers have studied the most important managerial practices that support creativity and innovation, as well as those that cause bottlenecks and break down the process, so managers can be more aware of the influence

of their own strategic actions. Fostering and sustaining high levels of creativity leading to meaningful and purposeful innovation has become one of the most significant roles of managers in the 21st century.

REFERENCES AND FURTHER READINGS

- Amabile, T. M. (1997). Motivating creativity in organizations. *California Management Review*, 40(1), 39–55.
- Amabile, T. M. (1998, September/October). How to kill creativity. *Harvard Business Review*, 76(5), 76–87.
- Amabile, T. M., Barsade, S. G., Mueller, J. S., & Staw, B. M. (2005). Affect and creativity at work. *Administrative Science Quarterly*, 50(3), 367–403.
- Amabile, T. M., Conti, R., Coon, H., Lazenby, J., & Herron, M. (1996). Assessing the work environment for creativity. *Academy of Management Journal*, 39(5), 1154–1184.
- Center for Creative Leadership. (2007). What does KEYS measure? *KEYS® to Creativity*. Retrieved September 2, 2007, from http://www.ccl.org/leadership/assessments/KEYSContent.aspx?pageId=64
- Csikszentmihalyi, M. (1996). *Creativity: Flow and the psychology of discovery and invention*. New York: HarperCollins.
- Ekvall, G. (1987). The climate metaphor in organizational theory. In B. M. Bass & P. J. G. Drenth (Eds.), *Advances in organizational psychology: An international review* (pp. 177–190). Newbury Park, CA: Sage.
- Fong, C. T. (2006). The effects of emotional ambivalence on creativity. *Academy of Management Journal*, 49(5), 1016–1030.
- Gardner, H. (1994). Creating minds. New York: Basic Books.
- Gardner, H. (2000). *Intelligence reframed: Multiple intelligences for the 21st century.* New York: Basic Books.
- Herrmann, N. (1996). *The whole brain business book*. New York: McGraw Hill.
- Hickman, C., & Raia, C. (2002). Incubating innovation. *Journal of Business Strategy*, 23(3), 14–18.
- Hughes, G. D. (2003, Summer). Add creativity to your decision processes. *The Journal for Quality and Participation*, 23(2), 4–13.
- Isaksen, S. G. (1995). CPS: Linking creativity and problem solving. In G. Kaufmann, T. Helstrup, & K. H. Teigen (Eds.), Problem solving and cognitive processes (pp. 145–181). Bergen-Sandviken, Norway: Fagbokforlaget Vigmostad & Bjorke AS.
- Isaksen, S. G., Dorval, B. K., & Treffinger, D. J. (2000). Creative approaches to problem solving: A framework for change. Dubuque, IA: Kendall Hunt Publishing.

- Kickul, J., & Gundry, L. K. (2001). Breaking through boundaries for organizational innovation: New managerial roles and practices in e-commerce firms. *Journal of Management*, 27(3), 347–361.
- Kirton, M. (1989). *Adaptors and innovators: Styles of creativity and problem solving*. New York: Routledge.
- Lubart, T. I., & Sternberg, R. J. (1988, December). Creativity: The individual, the systems, the approach. *Creativity Research Journal*, *1*, 63–67.
- Miner, J. B. (1997). A psychological typology of successful entrepreneurs. London: Quorum Books.
- Mumford, M. D., Whetzel, D. L., & Reiter-Palmon, R. (1997). Thinking creatively at work: Organization influences on creative problem solving. *Journal of Creative Behavior*, 31(1), 7–17.
- Nijstad, B. A., & Paulus, P. B. (2003). Group creativity: Common themes and future directions. In P. B. Paulus & B. A. Nijstad (Eds.), *Group creativity: Innovation through collaboration* (pp. 326–340). New York: Oxford University Press.
- Ornstein, R. E. (1977). *The psychology of consciousness*. New York: Harcourt Brace.
- Robinson, A. G., & Schroeder, D. M. (2004) *Ideas are free*. San Francisco: Berrett Koehler.
- Simonton, D. K. (1999). *Origins of genius: Darwinian perspectives on creativity*. New York: Oxford University Press.
- Sternberg, R. J. (Ed). (1999). *Handbook of creativity*. New York: Cambridge University Press.
- Wallas, G. (1926). The art of thought. New York: Franklin Watts.
- Wycoff, J. (2003, Summer). The big 10 innovation killers: How to keep your innovation system alive and well. *Journal of Ouality and Participation*, 26(2), 17–48.
- Yu, L. (2006). Is creativity a foreign concept? MIT Sloan Management Review, 48(1), 5.

CROSS-REFERENCES

Corporate Entrepreneurship (2)

Strategic Planning in New Ventures and Young SMEs (8)

Innovation as a Strategy in Network Markets (30)

New Product and Service Development in Strategic Alliances (33) Collaborative Innovation: Web-Based Tools for Customer Involvement in New Product Development (51)

Organization Development in the 21st Century (92)

Organizational Memory

Why Does It Matter?

KIM-CHI WAKEFIELD TRINH

National University of Singapore

rganization theorists, economists, and strategists have long sought to determine when organizations will be able to draw relevant information from their history. Although firms can sometimes learn from their experiences, we know that organizations and individuals frequently suffer from memory loss. Moreover, firms invest deeply in attempts to capture organizational memory in knowledge-management systems, but employees commonly underutilize these systems. As yet, our understandings on the performance benefits of organizational memory are still limited. These limited understandings likely stem from incomplete conceptualizations of information storage and retrieval and, in turn, from incomplete empirical tests.

Conceptualizations of information storage and retrieval explain the supply side and demand side of organizational memory. Supply-side conceptualizations describe the structure of organizational memory as information archives within an organization, including employees, ecology, structure, culture, and transformation processes. In addition, these conceptualizations also describe the structure of organizational memory in terms of external archives maintained by other organizations (e.g., news agencies, professional databases, tax agencies, and stock exchanges). These internal and external archival storages describe the existence of information in many places within and outside the organization. These storages constitute the distributed and overlapping structures of organizational memory.

One way to identify organizational memory is by its distributed structure. A distributed structure describes different information components that are stored in multiple locations within an organization (different pieces of information in different places). For instance, knowledge of how to weld metal exists in welding instruction manuals and in the heads of expert welders. Instruction manuals provide general information on how to weld, but expert welders have unique implementation skills that instruction manuals often do not capture.

Another way to identify organizational memory is by its overlapping structure. An overlapping structure describes the same information component that is stored in multiple locations within the organization (the same piece of information in different places). Continuing the welding example, general descriptive information about welding tools exists both in manuals and in the heads of experts (overlap between codified and noncodified information). In addition, welding instructions can appear in many books and on many Web sites (overlap of codified information).

In fact, organizational memory is often characterized by both a distributed structure and an overlapping structure. This dual characteristic makes it difficult to determine the effects of organizational memory on individual performance of organizational tasks. Doing so would require examining not only the supply side of organizational memory, but also the demand side of organizational memory.

Currently there exist few demand-side conceptualizations of organizational memory. Demand-side conceptualizations focus on information retrieval from particular storage sources. They differ from supply-side conceptualizations in two ways. First, demand-side conceptualizations can be less comprehensive because they focus on particular information

storage bins or sources that individuals utilize to accomplish their tasks. In this way, demand-side conceptualizations can overlook important information sources not utilized by individuals. Second, demand-side conceptualizations can link individual performance of organizational tasks to information stored in organizational memory. As a result, demand-side conceptualizations can provide measures to assess the effects of organizational memory on individual performance of organizational tasks. Overall, demand-side conceptualizations of organizational memory are less comprehensive than supply-side conceptualizations, yet they provide important insights for information management.

This chapter reviews supply-side and demand-side conceptualizations of organizational memory. It extends current conceptualizations by introducing two new organizational memory constructs. In addition, it uses measures from a new organizational memory construct to test hypotheses on how organizational memory can influence individual task performance. Finally, it provides discussions on empirical results and implications for management research and practice.

SUPPLY-SIDE CONCEPTUALIZATIONS OF ORGANIZATIONAL MEMORY

Walsh and Ungson (1991) have defined organizational memory, in its most basic sense, as stored information from an organization's history that can be brought to bear on present decisions. According to these organizational theorists, organizational memory consists of internal archives maintained within an organization (i.e., employees, ecology, structure, culture, and transformation processes) and external archives maintained by other organizations (e.g., news agencies, professional databases, tax agencies, and stock exchanges). This section describes supply-side conceptualizations of organizational memory as developed in the organizational theory literature.

Organizational Theory Literature

Studies in the organizational theory literature generally view organizational memory as storage bins or archives of information. These studies conceptualize how storage bins or archives of information can influence organizational performance. For example, in a study published by the Academy of Management Review in 1991, Walsh and Ungson developed seven propositions on the potential impact of organizational memory on organizational decision-making processes. These propositions are quoted verbatim here:

Decisions that are critically considered in terms of an organization's history as they bear on the present are likely to be more effective than those made in a historical vacuum.

Decision choices framed within the context of an organization's history are less likely to meet with resistance than those not so framed. Change efforts that fail to consider the inertial force of automatic retrieval processes are more likely to fail than those that do.

The automatic retrieval of past decision information that fails to meet the requirements of more novel situations is likely to promote deleterious decision making.

In inertial situations that call for routine solutions, the critical consideration of purposefully retrieved past decision information consumes a manger's time and energy and, thus, creates wasteful opportunity costs.

The controlled retrieval of decision information that is not examined in the context of novel situations is likely to promote deleterious decision making.

The self-serving manipulation of organizational memory's acquisition, retention, and retrieval processes by an organization's members will enable their autocratic entrenchment and, thus, compromise the organization's sustained viability.

Walsh and Ungson developed these propositions to illustrate the importance of organizational memory to firm performance. Other organizational theorists have also conceptualized the importance of organizational memory to firm performance. For example, Huber (2001) discussed organizational memory in the context of organizational learning, which is also essential for organizational performance.

In general, supply-side conceptualizations in the organizational theory literature tend to suggest the importance of organizational memory to firm performance. Nonetheless, there are shortcomings in these conceptualizations. They typically conclude that organizations can benefit from organizational memory but offer little guidance on how researchers can investigate these benefits in a systematic manner. Thus, a more comprehensive understanding of organizational memory requires a review of its supply-side conceptualizations.

DEMAND-SIDE CONCEPTUALIZATIONS OF ORGANIZATIONAL MEMORY

Currently, there exist few demand-side conceptualizations of organizational memory. Demand-side conceptualizations of organizational memory focus on how organizational memory can influence the performance of organizational members and their organizations. These conceptualizations tend to draw from studies in literature about psychology and the management of information system.

Psychology Literature

Studies in the psychology literature examine organizational memory at individual level (i.e., human memory). The human-memory literature demonstrates that individual recall of memory is imperfect. Many factors influence recall, including information availability, social desirability, and retention interval. Although such human memory

studies provide important insights on imperfect human recall, they pay little attention to the benefits from access to memory and the interplay between personal memories and external memory aids such as other people or external representations.

Studies in social psychology and situated-cognition literature provide insights into the interplay between personal memories and external memory aids. External memory aids involving human interactions can enhance memory storage and recall. Other external memory aids involving external representations (i.e., not involving human interaction) can improve performance in problem-solving tasks. Nonetheless, it is not clear in these studies whether external memory aids that involve human interactions are more effective than those that do not involve human interactions

Management of Information Systems Literature

Studies in the management of information systems literature commonly examine the use of particular computer systems designed to supplement an organization's memory at the individual and group levels. These studies tend to focus on technology systems intended to replace human and paper-based memory systems. For example, Ackerman (1996) studied how information technology can support business processes (i.e., providing insights into how and where information might be of use within organizations). To gain these insights, Ackerman developed two approaches to organizational memory: (a) by studying how organizations use information technology to make recorded knowledge retrievable and (b) by studying how organizations use information technology to connect people with knowledge to those without knowledge.

Ackerman employed these two approaches in the Answer Garden project. The Answer Garden project combined elements of information databases and communication systems. Using the Answer Garden software, organizational members can retrieve information from organizational databases. Moreover, if the computer systems cannot provide organizational members with the desired information from existing databases, they will link these members to appropriate human experts who can personally address their questions.

Studies in the information systems literature, such as those conducted by Ackerman, generally provide important insights on how organizational memory can influence individual performance. Nonetheless, they provide limited understandings on how noncomputer users can benefit from decision information components of organizational memory stored outside of computer systems.

EXTENSION OF CURRENT CONCEPTUALIZATIONS

Current conceptualizations provide limited understandings on the success or failure of using different sources of organizational memory. To extend these understandings, this chapter introduces two new organizational memory constructs. The social retrieval construct extends demand-side conceptualizations and separates sources of information by whether human interaction is required during retrieval. The risk-based storage construct extends supply-side conceptualization and separates information by the probability of information loss when employees leave the organization. These constructs distinguish organizational memory by information sources (nonsocial and social sources) and probability of information loss (low-risk and high-risk archives).

Social Retrieval Construct

The social retrieval construct identifies organizational memory using two categories of information sources differentiated by the social interaction characteristics of information retrieval. These categories consist of nonsocial and social sources. Nonsocial sources consist of the self (information users) and other sources that do not involve people (nonhuman sources). Nonsocial sources provide information without requiring human interaction. Users can retrieve all types of information in their personal archives (the self), but only some types of information available in other archives (nonhuman sources). Users' personal archives contain information that is either noncodified (in their heads) or codified (in their private offices). Other archives contain information that must be both codified and centralized in order for retrieval to occur without requiring human interaction (e.g., Web-based public lists of welding tools).

Social sources consist of other people providing information via human interaction. From social sources, users can retrieve all different types of information, including information that users cannot normally retrieve from nonsocial sources, such as noncodified information within human heads or codified information in private offices. For example, a colleague may have a particular list of welding tools that resides in his head and/or private office. To obtain this particular list, a user must interact with the colleague, even if the list contains explicit and codified information; as long as the information is in the source's private possession, a user cannot obtain the information without the source's permission.

Nonsocial and social sources are complementary categories separated by the human interaction requirement in information retrieval. They are not mutually exclusive sources of access to stored information. Most importantly, social sources offer access to all types of information in the organization, including information that is normally available from nonsocial sources. For example, a corporate intranet provides information that people can access from both nonsocial and social sources, because even a worker who lacks access to a computer (a nonsocial source) can ask a colleague (a social source) who does have intranet access to retrieve the information.

Risk-Based Storage Construct

The risk-based storage construct identifies organizational memory using two categories of information archives differentiated by the risk of information loss. They consist of low-risk archives and high-risk archives. These archives are differentiated by factors that influence the probability of information loss, particularly loss that occurs when knowledgeable people leave the organization.

Low-risk archives contain information that has a low probability of loss even if knowledgeable personnel leave the organization. Information is not likely to become lost after it has been codified and centralized (e.g., information stored in a knowledge management system by departed employees). Moreover, information is not likely to be lost when it is stored in multiple locations and forms. For example, it may be stored in hard copies, soft copies, or in people's head. Combinations of these factors add to the complexity of informa-

tion storage and retrieval—multiple people can have the same knowledge, which can be stored internally in people's heads and externally in hard and soft copies.

High-risk archives contain information that has a high probability of loss when people leave the organization. Information is likely to be lost when it can be retrieved only by its own archivists, especially when it has a unique content and unique access by unique owners. For example, ideas in a leader's head that have not been shared with other organizational members represent information with a high risk of loss because the information is unique and noncodified. Other information such as files in private offices can also face a high risk of loss because the information is unique and not centralized even though it is explicit and somewhat codified.

The risk-based storage construct accommodates the notion of external archives as a complementary memory source. Multiple individuals inside and outside the organization can retrieve information in external archives (e.g., news agencies and professional databases), which is less subject to loss following employee turnover. Table 95.1 describes the framework of organizational memory using the social retrieval and risk-based storage constructs.

HYPOTHESES ON THE EFFECTS OF ORGANIZATIONAL MEMORY ON INDIVIDUAL TASK PERFORMANCE

In general, the use of organizational memory can either enhance or constrain performance. Relevant dimensions of performance include individual task success, team product

Table 95.1	Social Retrieval and Risk-Based Storage Framework of Organizational Memory	
	Low-risk archives (content or control of access is not unique)	High-risk archives (content & control of access are unique)
Social sources (retrieval requires human interactions)	Both non-codified & codified info In dispersed & central locations Either content or control of access is not unique Retrieval requires human interactions Example: Common ideas	Both non-codified & codified info In dispersed locations Both content & control of access are unique Retrieval requires human interactions Example: Personal ideas
Non-social sources (retrieval does not require human interactions)	Only codified info In central locations Either content or control of access is not unique Retrieval does not require human interactions Example: Common references	Only codified info In central locations Both content & control of access are unique Retrieval does not require human interactions Example: Personal websites

development effectiveness, firm productivity, and innovation. This chapter reviews the effects of stored information on individual task performance, using measures from the social retrieval construct of organizational memory. In particular, it introduces an empirical study examining the potential positive aspects of access to different organizational memory sources on individuals' ability to solve business problems using decision information.¹

Assumptions About Task Environments

The effects of organizational memory can vary in different organizational task environments. This section describes three assumptions about different task environments in a typical organization.

First, information users in a typical organization will likely conduct multiple information processing tasks with multiple levels of complexity. For example, the same person can engage in both a complex task and a simple task (multitasking) within a short period (e.g., in the same day).

Second, information users will likely experience a high variance of emotions when working with other people (social sources) and low variance of emotions when working alone with manuals (nonsocial sources). Studies show that most human communications in American workplaces have to do with managing peoples' emotions. Task environments where people work together can be characterized by more intense emotions such as excitement, enthusiasm, and happiness (high positive effect) and distress, nervousness, or fear (high negative effect). By contrast, task environments where people work alone can be characterized by less intense emotions such as drowsiness, sleepiness, and slug-

gishness (low positive effect) and calmness, relaxation, and restfulness (low negative effect).

Third, information users will likely devote significant effort and time to developing and maintaining good relationships with human sources of information (high variance of emotions). By contrast, they do not have to develop or maintain good relationships with nonsocial sources of information (low variance of emotions).

Data Collection in a Simulated Task Environment

An empirical study was conducted in a controlled experiment over a continuous 11-hour period. The study involved nearly 200 business students in the same cohort solving 120 problems related to business plan evaluation. In the study, a task environment was simulated to meet the assumptions discussed in the previous section. Nonsocial sources were manipulated in the form of reference manuals users. Social sources were manipulated in the form of team members who have received training in specific areas needed for the tasks. Personal knowledge was measured by multiple-choice tests on conceptual understanding of the tasks.

Controlling for human efforts, task performance was expected to vary by two factors: a person's knowledge about the task and the external environment where he or she can retrieve the information needed to perform the task. With respect to the first factor, a person's requisite knowledge was measured before he or she started the task. For example, the task required a person to determine the financial performance of a company using internal rate of return measures (the IRR formula). The requisite knowledge of this task was the IRR formula. Two scenarios related to personal knowledge were considered in this context: (a) the person has the necessary personal knowledge (the IRR formula) to accomplish the task and (b) the person does not have the necessary personal knowledge to accomplish the task. Moreover, there were four scenarios related to external sources of information: (a) the person does not have access to any external sources, (b) the person has access to social sources, (c) the person has access to nonsocial sources, and (d) the person has access to both social and nonsocial sources.

Let us consider a particular case in which the person does not know the IRR formula. In this case, he or she faces multiple choices. First, the person can skip the problem. Second, he or she can guess the solution. Third, he or she can consult a financial accounting handbook (a nonsocial source) for the formula before attempting to solve the problem. Fourth, the person can go to a financial accountant (a social source) to ask for the formula or even the solution itself. Moreover, the person can also do a combination of these activities.

Empirical Tests

This chapter describes an empirical study modeled after the previous example. The study draws on supply-side and demand-side conceptualizations of organizational memory. It develops and tests three hypotheses on how well an individual can accomplish organizational tasks conditioned on whether he or she has personal knowledge, access to social sources of information, and/or access to nonsocial sources of information.

Hypothesis 1

The first hypothesis focuses on information users without personal knowledge but with access to either social or nonsocial sources. It predicts an information user without personal knowledge but with access to social sources will perform better than another user with access to nonsocial sources.

Motivations for this hypothesis are drawn from studies in psychology, management of information systems, and organizational learning literature. There are three key arguments. First, information users tend to prefer social sources to nonsocial sources. Second, information users tend to utilize social sources more extensively than nonsocial sources. Third, information users can obtain from social sources both the needed information and the help to process the needed information; by contrast, information users can obtain from nonsocial sources only the needed information, but not help in processing the needed information (when nonsocial sources do not employ computer technology). Following these arguments, it has been hypothesized that without personal knowledge, the effect of access to social sources alone on task performance is greater than the effect of access to nonsocial sources alone (Hypothesis 1).

Hypothesis 2

The second hypothesis focuses on information users without personal knowledge and access to both social and nonsocial sources. In this case, both social and nonsocial sources provide the same needed information that is not available from personal knowledge. The prediction follows Hypothesis 1 by suggesting a less knowledgeable information user with access to social sources will perform better than another user with access to nonsocial sources. However, it extends Hypothesis 1 by suggesting that an information user without personal knowledge will gain fewer additional benefits from nonsocial sources when he or she has access to social sources.

Motivations for this hypothesis flow from a hypothetical question of what happens when an information user does not have personal knowledge but has access to both social and nonsocial sources of information. The basic argument is if the person does not know how to begin solving a problem, he or she should rely on an expert (a social source) who can provide instructions and possibly the actual solution. Moreover, the person should not rely on a manual (a nonsocial source) that can only provide instructions on how to solve a problem, especially when he or she does not know how to follow those instructions.

Conceptually, within a typical organization, information users cannot process all information available from both social and nonsocial sources because they have limited information processing capabilities. Often they have to choose between multiple sources. Their choices will likely reflect different tradeoffs associated with social and nonsocial sources.

Information users without personal knowledge will likely identify the trade-offs associated with social sources by their high-cost/high-benefit structure. The costs of gaining access to social sources can be high for all information users because they have to invest in maintaining relationship with people as their sources of information. These costs can be emotions and time. However, the benefits of social sources can be especially high for information users without personal knowledge because, as discussed, they will likely benefit from working with people who can provide not only the information for the task, but also possibly the task solution. (This saves them from having to complete information processing activities.)

Information users without personal knowledge will likely identify the trade-offs associated with nonsocial sources by their low-cost/low-benefit structure. The costs of gaining access to nonsocial sources can be low for all information users because they do not have to maintain relationships with people when working alone. However, the benefits of nonsocial sources can also be low because they do not generally provide additional information processing capabilities (when they do not involve computer technology).

Without personal knowledge, information users can benefit from both social and nonsocial sources. Economically, social sources can trump nonsocial sources for those without personal knowledge. The reason is that social sources can provide both the needed information and the ability to process the needed information, whereas nonsocial sources can provide only the needed information. Psychologically, social sources can also trump nonsocial sources for those without personal knowledge. Based on studies of human preference for different sources of information, information users will likely ignore nonsocial sources when social sources are equally available. Following these arguments, it has been hypothesized that without personal knowledge, the effect of access to nonsocial sources reduces with access to social sources (Hypothesis 2).

Hypothesis 3

The third hypothesis focuses on information users with personal knowledge and access to both social and nonsocial sources. In other words, information overlaps from three sources: personal knowledge, social sources, and nonsocial sources. Hypothesis 3 extends the arguments developed in Hypothesis 2. In particular, Hypothesis 2 suggests information users without personal knowledge will gain less additional benefits from nonsocial sources when they have access to social sources. Hypothesis 3 extends

Hypothesis 2 by suggesting that information users with personal knowledge will gain fewer additional benefits from social sources than from nonsocial sources when both sources provide the same needed information.

The main motivation for Hypothesis 3 has to do with information-processing capabilities. When information users have personal knowledge about the task, they will likely have the necessary information-processing capabilities to accomplish the task. They are different from information users who do not have personal knowledge about the task. Hence, they will likely experience a different set of tradeoffs when it comes to information choices between social sources and nonsocial sources.

Information users with personal knowledge will likely identify the trade-offs associated with social sources by their high-cost/low-benefit structure. For reasons already discussed, the costs of social sources are universally high for all information users regardless of their knowledge level. However, the benefits of social sources for knowledgeable users can be low, because they may not need the additional information processing capabilities that are uniquely associated with social sources.

Information users without personal knowledge will likely identify the trade-offs associated with nonsocial sources by their low-cost/high-benefit structure. Following the previous discussion, the costs of nonsocial sources are universally low for all information users regardless of their knowledge level. Nonetheless, the benefits of nonsocial sources for knowledgeable users can be high, because they already have the ability to process information and can quickly arrive at a solution provided additional information about the task is known.

With personal knowledge, information users cannot cumulatively benefit from both social and nonsocial sources. Economically, nonsocial sources can trump social sources for those with personal knowledge who do not necessarily benefit from social sources more than from nonsocial sources. With social sources having a high-cost structure and nonsocial sources having a low-cost structure, knowledgeable users are better off working with nonsocial sources. Following these arguments, personal knowledge has been hypothesized to interact with social sources and nonsocial sources; hence, with personal knowledge, the effect of access to social sources alone on task performance reduces more than the effect of access to nonsocial sources alone (Hypothesis 3).

Boundary Conditions

These three hypotheses provide insights on the interactions between personal knowledge, social sources, and nonsocial sources and their joint influences on individual task performance. At the same time, they also highlight three important boundary conditions. First, the predictions apply to cases in which information users face time constraints in performing organizational tasks. Second, social sources are substitutes, not complements, for nonsocial sources. Third,

recent advances in computer technology might allow nonsocial sources to mimic social sources in cueing users to retrieve and process information effectively. Such technology sometimes offers better ease of search than via social sources. For example, computer search engines can help bring information from dispersed locations to the users' desktop with minimal user effort. Some technology enables categorical and full-text search that can potentially make nonsocial sources more efficient than social sources. Hence, it is possible that nonsocial sources employing computer technology can provide additional information processing capabilities similar to those provided by social sources. This chapter reports a study that empirically investigates cases in which nonsocial sources do not employ computer technology.

EMPIRICAL TESTS

These hypotheses were tested in controlled experimental settings. As expected, the results on the effects of personal knowledge follow basic intuition. Information users with personal knowledge are twice as likely as users without personal knowledge to arrive at the right task solutions. Note that information users without personal knowledge can skip the task or guess at the solution. Other results provide support for all three hypotheses.

Hypothesis 1 suggests that without personal knowledge, the effect of access to social sources on task performance is greater than the effect of access to nonsocial sources. Two important results arise from tests of Hypothesis 1. First, information users without personal knowledge but with access to social sources are three times more likely to arrive at the right task solution than users without personal knowledge or access to any external source of information. In other words, knowing people who know triples the odds of arriving at the right solution. Second, information users without personal knowledge but with access to nonsocial sources are 34% more likely to arrive at the right task solution than users without personal knowledge or access to any external source of information. In other words, having relevant manuals improves the odds by 34%.

As reported, with personal knowledge, task performance improves by 100%. Without personal knowledge, task performance improves by 200% with social sources and 34% with nonsocial sources. However, the benefits are not cumulative. Hypothesis 2 suggests that information users without personal knowledge do not benefit cumulatively from having access to both social sources and nonsocial sources. In particular, the effect of access to nonsocial sources on task performance is expected to reduce with access to social sources. Results show that information users without personal knowledge but with access to both social and nonsocial sources do not benefit cumulatively from having more information. In fact, their aggregate task performance benefits reduce by 24% when they have access to all three sources of information: personal knowledge, nonsocial sources, and social sources.

Hypothesis 3 extends Hypothesis 2 by suggesting that with personal knowledge, the effect of access to social sources reduces more than the effect of access to nonsocial sources. As in Hypothesis 2, results show information users do not benefit cumulatively from having access to both social and nonsocial sources. For information users with personal knowledge, the aggregate task performance benefits of having access to both personal knowledge and social sources reduce 40%. By contrast, the aggregate task performance benefits of having access to both personal knowledge and nonsocial sources reduce by only about 19%.

DISCUSSION

This chapter has two main objectives. The first has to do with the development of the social retrieval and risk-based storage constructs of organizational memory. The second has to do with the effects of organizational memory on individual task performance.

Results from this analysis confirm basic insights about organizational memory and extend these insights into new arenas. First and perhaps most intuitively, better task performance arises from both greater personal knowledge and access to external memory aids via social sources and nonsocial sources. Second, social sources and nonsocial sources have substantially different effect sizes: having access to people who likely have relevant information in their personal possession is more effective than having access to manuals with the relevant information. Third, in the absence of personal knowledge, users do not utilize all information available from social and nonsocial sources: The aggregate task performance benefits from access to both sources are less than the sum of the benefits from access to discrete social and nonsocial sources. Fourth, given a decline in aggregate task performance benefits, the benefits from access to social sources decline less than the benefits from access to nonsocial sources when users have access to both sources (i.e., results of the study present an extreme case of users ignoring nonsocial sources completely). Fifth, task performance benefits from access to personal knowledge decline with access to both social and nonsocial sources of knowledge. For example, people must have some personal knowledge in order to benefit from having manuals; however, they must not have some personal knowledge in order to benefit from having access to other people.

These results shed light on issues described in the introduction: (a) organizations and individuals within organizations can learn from their past, yet they frequently suffer from memory loss, and (b) firms invest in knowledge management systems, yet employees tend to underutilize them.

Concerning the first, this conceptual framework identifies occasions of memory loss within the firm—when employees who have unique control of unique information leave the firm. It specifies the probability of memory loss linked to employee turnover—only information in the high-

risk archives is likely to be lost when employees leave the firm; other information in the low-risk archives, retrievable from both social and nonsocial sources, is not likely to be lost when employees leave the firm. However, given the strong preference for social sources, the loss of a social contact can be very important. Moreover, even if the information could be accessed from nonsocial means, it may not be—especially when there is a lack of personal knowledge necessary to extract the benefits from access to information available via nonsocial sources.

Concerning the second, empirical tests demonstrate returns on firms' investment in nonsocial sources of information (reference manuals improved task performance by 34%). Although we expect a greater improvement with knowledge management systems, the results with reference manuals can explain why firms continue to invest in nonsocial sources even when studies show that employees tend to underutilize them—because users benefit from nonsocial sources (34% more than when they have no access to any external memory aid).

These results also explain a follow-up question—why do employees underutilize nonsocial sources when they can benefit from them? In normal organizational settings, users often have options between social and nonsocial sources of information within the organization. On the one hand, nonsocial sources generate a 34% improvement in performance benefits when compared to having no access to any external memory aid. On the other hand, nonsocial sources generate a 77% reduction in performance benefits when compared to having access to people who likely have the relevant information. These findings have implications for researchers and managers.

Implications for Researchers

By extension, this analysis has implications for explaining two ambiguous empirical findings on the effects of employee turnover and firms' investment in knowledge management systems in existing literature. The first ambiguity is that studies in literature are not clear on the effects of employee turnover; some studies show firms are negatively affected by employee turnover, whereas other studies show firms are not affected. This ambiguity can be explained by looking at the supply side and the demand side of organizational memory.

From the supply side, employee turnover does not necessarily equate with a loss of access to information—firms only lose unique information in control of unique employees who leave the firm (high-risk archives). Hence, the effect of employee turnover on performance can potentially be moderated by whether the relevant information held by departing employees exists in the high-risk or low-risk archives. A negative effect is expected if the information exists only in the high-risk archives. No effect is expected if the information exists in the low-risk archives or is readily available in the external archives. For example, a departure of a highly skilled specialist hurts the operation

of the firm only if his skills are so unique that the firm cannot replace him with another person internally (low-risk archives) or externally (external archives). Nonetheless, if the person is a key node in a social network, and thus a way of getting to the information that is held in external archives or with another employee, the loss may be important.

From the demand side, users prefer and benefit from social sources more than from nonsocial sources; hence, employee turnover may cause the remaining employees to believe that their performance will suffer. Thus, researchers' choices of performance measures are expected to moderate the effect of employee turnover. In particular, subjective measures of task performance can be associated with a negative effect of employee turnover, whereas objective measures can be associated with other effects driven primarily by supply-side factors as previously discussed.

The second ambiguity is that the literature is not clear on the performance impact of firms' investments in knowledge management systems. In particular, it is not clear why firms continue to make these investments even when it has been shown that employees tend to underutilize these resources. Again, this ambiguity can be explained by looking at the supply side and demand side of organizational memory. From the supply side, information stored in knowledge management systems is not likely to be lost when employees leave the firm (low-risk archives). From the demand side, access to nonsocial sources has greater benefits for task performance than no access.

Implications for Managers

These results are unlikely to surprise some users of organizational memory, because studies show people commonly prefer social sources to nonsocial sources of information. However, they are highly relevant for shaping incentives to invest in different retrieval mechanisms. Two important questions arise concerning the trade-offs associated with investments in social sources and nonsocial sources. First, social sources are more susceptible to loss due to employee turnover, but they are also more effective than nonsocial sources-what can managers do to reduce the risk of memory loss associated with social sources? Second, nonsocial sources are less susceptible to loss due to employee turnover, but they are also less effective than social sources—what can managers do to improve the performance impact of non-social sources? The following are some potential answers to these questions.

The first challenge for managers is to reduce the risk of memory loss associated with the social sources of organizational memory. Managers can do this with supply-side and demand-side solutions. The supply-side solution involves investments in knowledge management systems, effectively making information available from people (social sources) and from computers (nonsocial sources). The demand-side

solution involves information sharing among employees, effectively turning unique information available from unique employees (high-risk archives) into shared information available from multiple employees (low-risk archives).

In practice, the supply-side solution—investing in the nonsocial sources—has been a common approach; firms have invested millions of dollars to capture organizational memory in knowledge management systems. Nonetheless, employees tend to underutilize these resources. This brings us to the demand-side solution, which we believe has been underemphasized. The risk of memory loss due to employee turnover associated with social sources may well outweigh the benefits.

This study provides information about the relative benefits from access to social and nonsocial sources of organizational memory. It identifies ways to reduce the risk of memory loss associated with social sources in that noncodified and dispersed information that exists in multiple locations is not highly susceptible to loss during employee turnover. (Table 95.1 describes the framework of organizational memory.) Specifically, it suggests that managers can benefit from investing in low-risk archives that make up social sources. They can do this through a system of apprenticeship or in discussion groups, in which organizational members share information without having to undertake codification and centralization.

The second challenge for managers is to improve the performance impact of nonsocial sources to rival that of social sources. Managers can do this by acquiring advanced technology to augment the performance impact of nonsocial sources at two levels. At the macro level, technology provides categorical search by bringing information from dispersed locations to the users. For example, computer databases such as ProQuest can bring required articles to users' desktops. However, users still have to read them to find relevant information. At the micro level, technology provides full-text search by facilitating information processing and enabling users to sieve through available information more effectively. For example, computer search engines such as Google Desktop, Microsoft's "find," and Acrobat's "search" can help users to conduct micro searches of keywords within documents.

Limitations

The study introduced in this chapter manipulated nonsocial sources in the form of reference manuals that are readily available to the users. This approach neglects the use of technology which can potentially improve the performance impact of nonsocial sources. Specifically, users of nonsocial sources can benefit from technology that simulates an interactive cueing process similar to that occurring among social sources of information. This cueing process can mimic social sources in providing solutions with appropriate inputs. The extent of this improvement—whether nonsocial sources can rival that of social sources in performance impact—remains open for future investigations.

Future Research Directions

These findings generate a number of questions for future research. First, it would be useful to examine negative aspects of organizational memory, such as the potential for trapping organizations in suboptimal past activities.

Second, organizations have different incentive structures for users and sources. Some firms reward users and sources equally, whereas other firms do not. Future investigations are needed to advance understanding on whether social sources will generate greater benefits than nonsocial sources if users and sources do not share similar goals and incentives.

Third, it is not clear when the use of computer technology might augment the performance benefits from access to nonsocial sources to the point that they would rival the benefits from access to social sources. With increasingly advanced search technology, the benefits from access to nonsocial sources through use of a computer will likely be greater than those without; nonetheless, the tacit and organizationally embedded nature of much relevant knowledge suggests that social sources will continue to be highly relevant sources of organizational memory.

CONCLUSION

This research conceptualizes organizational memory as information stored in high-risk and low-risk archives within the organization that people can retrieve from social and/or nonsocial sources when they need to make current decisions. It provides insights into the task performance benefits of organizational memory by examining the direct and interactive effects of access to personal knowledge, social sources, and nonsocial sources of information. The analyses of task performance benefits of organizational memory extend understandings beyond conventional wisdom, such as "the smarter you are, the better you do." Most importantly, the findings provide explanations for several firm activities that have puzzled researchers and managers.

Overall, this chapter provides evidence to support normal firm practice of hiring the most qualified employees as well as controversial firm practices such as investing in knowledge management systems and discounting environmental factors characterized by transactive measures of specialization, credibility, and coordination. Firm practice of hiring the most qualified employees is a way of using personal knowledge to facilitate task performance. This research shows personal knowledge is the biggest determinant of task performance. At the same time, this research also recognizes that jobs can change over time, and employees' personal knowledge may not always be available. These factors give rise to controversial firm practices.

Firm practice of investing in knowledge management systems is a way of using nonsocial sources to facilitate task performance. This research shows nonsocial sources can improve the task performance of employees who have personal knowledge more than employees who lack personal

knowledge. It suggests that firms get a good return for their investments in knowledge management systems when they hire knowledgeable employees and when these systems support routine tasks (i.e., employees usually know how to process these tasks). The problem, however, concerns nonroutine tasks (i.e., employees face the challenge of figuring out how to process these tasks, which are beyond their existing knowledge). This research shows the effects of personal knowledge and social sources increase when tasks become more complex. These results suggest a challenge for firms to maintain a balance between investing in nonsocial and social sources in support of different types of tasks within their organizations.

NOTE

1. Organizational memory may also have a negative impact on performance, such as through the use of outdated information, but such negative impact is beyond the scope of this chapter.

REFERENCES AND FURTHER READINGS

- Ackerman, M. S. (1996). Definitional and contextual issues in organizational and group memories. *Information Technology & People*, *9*(1), 10–24.
- Alavi, M., & Leidner, D. (1999). Knowledge management systems: Issues, challenges, and benefits. *Communications of the Association for Information Systems*, *1*(7), 1–36.
- Anand, V., Manz, C. C., & Glick, W. H. (1998). An organizational memory approach to information management. *Academy of Management Review*, 23(4), 796–809.
- Argote, L. (1999). Organisational learning: Creating, retaining, and transferring knowledge. Norwell, MA: Kluwer.
- Argote, L., & Ingram, P. (2000). Knowledge transfer: A basis for competitive advantage in firms. *Organizational Behavior and Human Decision Processes*, 82(1), 150.
- Baddeley, A. D. (1998). *Human memory: Theory and practice* (Rev. ed.). Boston: Allyn and Bacon.
- Bartlett, F. C. (1932). *Remembering*. London: Cambridge University Press.
- Brown, J. S., & Duguid, P. (1991). Organizational learning and communities-of-practice: Toward a unified view of working, learning, and innovation [Special issue]. *Organization Science*, 2(1), 40–57.
- Bystrom, K. (2002). Information and information sources in tasks of varying complexity. *Journal of the American Society for Information Science*, 53(7), 581–591.
- Bystrom, K., & Hansen, P. (2005). Conceptual framework for tasks in information studies. *Journal of the American Society for Information Science and Technology*, 56(10), 1050–1061.
- Bystrom, K., & Järvelin, K. (1995). Task complexity affects information seeking and use. *Information Processing & Management*, 31(2), 191–213.
- Campbell, D. T. (1988). Task complexity: A review and analysis. *Academy of Management Review, 13*(1), 40–52.
- Dennis, A. R. (1996). Information exchange and use in group decision making: You can lead a group to information, but you can't make it think. *MIS Quarterly*, 20(4), 433–457.

- Galbraith, J. R. (1977). Organization design. Reading, MA: Addison-Wesley.
- Gladstein, D. L. (1984). Groups in context: A model of task group effectiveness. Administrative Science Quarterly, 29(4), 499–517.
- Huber, G. P. (1991). Organizational learning: The contributing processes and the literatures [Special issue]. *Organization Science*, 2(1), 88–115.
- Huber, G. P. (2001). Transfer of knowledge in knowledge management systems: Unexplored issues and suggested studies. European Journal of Information Systems, 10(2), 72–79.
- Kogut, B., & Zander, U. (1992). Knowledge of the firm, combinative capabilities and the replication of technology. *Organization Science*, *3*(3), 383–397.
- Kogut, B., & Zander, U. (1996). What firms do? Coordination, identity, and learning. Organization Science, 7(5), 502–518.
- March, J. G., & Simon, H. A. (1958). *Organizations*. New York: Wiley.
- Markus, L., & Keil, M. (1994). If we build it, they will come: Designing information systems that people want to use. *Sloan Management Review*, *35*(4), 11–25.
- McGrath, J. E., & Argote, L. (2001). Group processes in organizational contexts. In M. A. Hogg & R. S. Tindale (Eds.), Blackwell handbook of social psychology: Group processes (Vol. 3). Oxford, UK: Blackwell.
- McGrath, J. E., Arrow, H., & Berdahl, J. L. (2000). The study of groups: Past, present, and future. *Personality and Social Psychology Review*, 4(1), 95–105.
- Moreland, R. L., & Myaskovsky, L. (2000). Exploring the performance benefits of group training: Transactive memory or improved communication? *Organizational Behavior & Human Decision Processes*, 82(1), 117–133.
- Olivera, F. (2000). Memory systems in organizations: An empirical investigation of mechanisms for knowledge collection, storage and access. *Journal of Management Studies*, *37*(6), 811.
- Simon, H. A. (1990). Invariants of human behavior. *Annual Review of Psychology*, 41(1), 1–19.
- Simon, H. A. (1991). Bounded rationality and organizational learning [Special issue]. *Organization Science*, 2(1), 125–134.
- Stein, E. W. (1995). Organizational memory: Review of concepts and recommendations for management. *International Journal of Information Management*, 15(1), 17.
- Walsh, J. P. (1995). Managerial and organizational cognition: Notes from a trip down memory lane. *Organization Science*, 6(3), 280–321.
- Walsh, J. P., & Ungson, G. R. (1991). Organizational memory. *Academy of Management Review*, 16(1), 57.
- Wegner, D. M. (1987). Transactive memory: A contemporary analysis of the group mind. In B. Mullen & G. R. Goethals (Eds.), *Theories of group behavior* (pp. 185–208). New York: Springer-Verlag.
- Wegner, D. M., Erber, R., & Raymond, P. (1991). Transactive memory in close relationships. *Journal of Personality and Social Psychology*, 61(6), 923–929.
- Wegner, D. M., Giuliano, T., & Hertel, P. T. (1985). Cognitive interdependence in close relationships. In W. J. Ickes (Ed.), *Compatible and incompatible relationships* (pp. 253–276). New York: Springer-Verlag.
- Zander, U., & Kogut, B. (1995). Knowledge and the speed of the transfer and imitation of organizational capabilities: An empirical test. *Organization Science*, 6(1), 76–92.

WHY CATASTROPHIC ORGANIZATIONAL FAILURES HAPPEN

MICHAEL A. ROBERTO

Bryant University

n January 16, 2003, the Columbia space shuttle set out on its 28th flight into space, in what was characterized as a routine scientific mission. The shuttle disintegrated 2 weeks later while reentering the earth's atmosphere, killing the seven astronauts onboard. Soon thereafter, the Columbia Accident Investigation Board (CAIB, 2003)—a star-studded panel of experts on the safety of complex, high-risk systems—began trying to understand what had gone so terribly wrong. The investigative board determined the technical cause of the accident within several months. A piece of insulating foam had dislodged from the external tank of the shuttle during launch. That foam debris struck the leading edge of the vehicle's wing, puncturing a hole in it. During the shuttle's return to the earth's atmosphere at the end of the mission, extremely hot gases entered the interior of the wing through that hole, melting the structure from the inside out. That melting caused the breakup of the vehicle.

The investigators did not simply conduct a technical analysis of this catastrophic failure. They went on to evaluate the organizational systems, processes, and behaviors that enabled the tragedy to occur. They wanted to understand why NASA kept launching the shuttle despite a lengthy history of foam strike problems. They sought to determine why management had concluded that the astronauts were safe, despite some engineers' serious concerns about the foam strike. The board members noticed organizational problems similar to those uncovered during the 1986 *Challenger* accident investigation, and they wondered why NASA had not corrected those problems in subsequent years. In the words

of CAIB member Deal (2004), a retired Air Force General, the investigators sought to go "beyond the widget" during their analysis. They wanted to understand the organizational causes of the catastrophic failure, not simply the technical cause (i.e., the widget that broke). Deal summarized the board's findings: "The foam did it. The organization allowed it" (p. 44).

As the board conducted its investigation, many management scholars turned their attention to the Columbia accident as well. These researchers typically wanted to go "beyond the widget" (Deal, 2004) to understand the human and organizational conditions that led to this tragedy. The scholars that studied the Columbia accident followed in a long tradition of research into catastrophic failures. Prior studies had examined incidents such as the 1977 Tenerife airliner collision, the 1979 Three Mile Island nuclear power plant accident, the 1986 Challenger explosion, and the 1994 friendly fire incident in the Iraqi no-fly zone. Why should management researchers be interested in these types of complex and unusual tragedies? According to Starbuck and Farjoun (2005), who coedited a book about the Columbia accident, catastrophic failures "dramatize how things can go wrong, particularly in large, complex social systems, and so they afford opportunities for reflection, learning, and improvement." These thick, rich descriptions of organizational systems and behaviors provide the data required for provocative new theory building.

The purpose of this chapter is to examine the major streams of research about catastrophic failures, describing what we have learned about why these failures occur as well as how they can be prevented. The chapter begins by describing the most prominent sociological school of thought with regard to catastrophic failures, namely normal accident theory. That body of thought examines the structure of organizational systems that are most susceptible to catastrophic failures. Then, we turn to several behavioral perspectives on catastrophic failures, assessing a stream of research that has attempted to understand the cognitive, group, and organizational processes that develop and unfold over time, leading ultimately to a catastrophic failure. For an understanding of how to prevent such failures, we then assess the literature on high-reliability organizations (HRO). These scholars have examined why some complex organizations operating in extremely hazardous conditions manage to remain nearly error free. The chapter closes by assessing how scholars are trying to extend the HRO literature to develop more extensive prescriptions for managers trying to avoid catastrophic failures.

A STRUCTURAL PERSPECTIVE

Research on catastrophic failures traces its roots to a groundbreaking study of the Three Mile Island nuclear power plant accident and the development of normal accident theory. In his 1984 book, Normal Accidents, Perrow examined the structural characteristics of organizational systems that involve high-risk technologies such as nuclear power. Perrow's conceptual framework classifies all highrisk systems along two dimensions: interactive complexity and coupling. Interactions within a system may be simple/ linear or complex/nonlinear. Coupling may be either loose or tight. Perrow argued that systems with high levels of interactive complexity and tight coupling are especially vulnerable to catastrophic failures. In fact, he argued that accidents are inevitable in these situations; certain failures constitute "normal accidents." Perrow (1981) concluded, "Normal accidents emerge from the characteristics of the systems themselves. They cannot be prevented" (p. 17).

Interactive complexity refers to the extent to which different elements of a system interact in ways that are unexpected and difficult to perceive or comprehend. Often, these interactions among elements of the system are not entirely visible to the people working in the organization. Simple, linear interactions characterize systems such as a basic manufacturing assembly line. In that instance, the failure of a particular piece of equipment typically has a direct, visible impact on the next station along the line. The operations of a nuclear power plant do not follow a simple linear process; instead, they are characterized by complex and nonlinear interactions among various subsystems. The failure of one component can have multiple, unanticipated effects on various subsystems, making it difficult for an operator to diagnose the symptoms of a developing catastrophe.

Tight coupling exists if different elements of an organizational system are highly interdependent and closely linked to one another, such that a change in one area quickly

triggers changes in other aspects of the system. Tightly coupled systems have four attributes: time-dependent processes, a fairly rigid sequence of activities, one dominant path to achieving the goal, and very little slack. When such rigidity exists within an organization, with few buffers or slack among the various parts, small problems can cascade quickly throughout the system leading to catastrophe. Loose coupling exists when subsystems are not as tightly integrated, such that small errors in one area can be isolated or absorbed without affecting other subsystems.

Engineers naturally try to account for the fact that components or subsystems might fail, or human error might occur, in a high-risk technological system. They design backup systems to deal with those contingencies. However, engineers encounter difficulty when a strong possibility exists for multiple failures to occur in a nearly simultaneous fashion. When interactive complexity and tight coupling exist, then the possibility exists for a series of unanticipated, interconnected breakdowns that can quickly build upon one another. In short, normal accidents often do not have a single cause; they involve a chain of multiple failures. That chain often proves difficult to detect and break before catastrophe strikes.

Psychologist Reason (1997) also argued that catastrophic accidents typically involve a chain of failures rather than a single cause. In his famous "Swiss cheese" analogy, an organization's layers of defense or protection against accidents are described as slices of cheese, with the holes in the block of cheese representing the weaknesses in those defenses. In most instances, the holes in a block of Swiss cheese do not line up perfectly, such that one could look through a hole on one side and see through to the other side. In other words, a small error may occur, but one of the layers of defense catches it before it cascades throughout the system. However, in some cases, the holes become completely aligned, such that an error can traverse the block, that is, cascade quickly through the organizational system.

Critique of Normal Accident Theory

Normal accident theory has certain limitations. First, many scholars and practitioners find the theory frustrating in that it does not move us toward an understanding of how to prevent catastrophic accidents. It appears to have little prescriptive value. They point out that we should not simply resign ourselves to the inevitability of failure in certain situations. Instead, we should try to develop an understanding of how we might reduce the probability of normal accidents. To begin, scholars point out that we can design safer systems by addressing the very attributes defined by Perrow (1981, 1984). By trying to reduce interactive complexity and tight coupling, engineers and managers can begin to construct safer systems. We will discuss other remedies for preventing catastrophic failures when we address the HRO literature in a subsequent section. For now, it should simply be pointed out that the HRO scholars have tried to identify the behaviors, norms, and processes required to raise people's awareness of interdependencies and interaction effects, as well as to catch small errors before they cascade throughout a system.

A second major criticism refers to the problems inherent in the classification scheme itself. The two system dimensions articulated by Perrow (1981, 1984) are useful in helping us understand the vulnerability of organizations. However, one cannot easily classify organizations in his two by two matrix. For instance, many scholars have characterized commercial aviation as a complex system prone to normal accidents. Marais, Dulac, and Leveson (2004) pointed out the flaws in this argument. They argue that the U.S. air traffic control infrastructure has been deliberately designed as loosely coupled system. Various measures exist to ensure that problems in one sector of airspace or on one particular flight are unlikely to have an impact on the safety of other flights. Similarly, Snook (2000) examined the 1994 accidental shootdown of two U.S. Black Hawk helicopters by U.S. fighter jets in northern Iraq. Based on Perrow's earlier discussion of military and aviation systems, he cannot discern whether the incident should be characterized as a tightly or loosely coupled system. Snook went on to argue that complex organizational systems are fundamentally dynamic entities, and coupling may not be a static property of such systems. Drawing on Weick's (1976) earlier work, Snook made the case that the organization responsible for maintaining a no-fly zone over northern Iraq shifted between loose and tight coupling over time. He argued that coupling may be situational, rather than an enduring property of organizations. A system might be loosely coupled most of the time, but then in certain relatively rare situations, it becomes rigidly interdependent and interconnected. In those instances, the likelihood of a catastrophic accident escalates dramatically. The critical question, then, is not whether a system exhibits tight or loose coupling, but instead, how and when a system migrates from loose to tight coupling and what can be done to prevent that migration from occurring.

BEHAVIORAL PERSPECTIVES

In contrast to normal accident theory, another stream of researchers has studied the cognitive, group, and organizational processes that lead to the failure to detect errors and/or the failure to address errors before they lead to a catastrophic failure. These researchers have focused much more attention on behavior, rather than solely focusing on the structural dimensions of organizational systems. They also have focused much more on the historical evolution of catastrophic accidents. They do not examine only the momentous decision that might have immediately preceded a tragedy (e.g., the critical eve-of-launch meeting that took place prior to the *Challenger* accident), nor do they focus exclusively on the immediate chain of events that led to a failure (e.g., the breakdowns in communication that took place on the morning of April 14, 1994 in northern Iraq).

Instead, these scholars examine the gradual development of norms, beliefs, and attitudes that contribute to unsafe action. They try to understand the history of decisions that were made in an organization, as well as the danger signs that may have been downplayed or misinterpreted over time. This approach to studying failures can be traced back to Turner's seminal book, Man-Made Disasters, published in 1978. He argued that many catastrophic failures were characterized by incubation periods that stretched over many years, not days or hours. He made a strong case for how catastrophic accidents were processes, not events. They did not simply happen at a point in time; they unfolded in a gradual accumulation of actions, decisions, and interpretations by many actors within an organization. As such, catastrophic failures required intensive longitudinal study. Since Turner's work, many behavioral studies have been done, but a few major developments in the field should be highlighted here, not simply because they help us understand better why catastrophic failures occur, but also because they provide important guidance as to how we should study failures moving forward.

From Proximate Choices to Patterns of Decisions

After the Challenger accident in 1986, many scholars focused on the decision to launch in cold weather on a January morning, and in particular, on the critical meeting that took place on the eve of the launch. During that infamous midnight teleconference, some engineers argued that the unprecedented cold temperatures expected for the following morning could lead to O-ring failure during launch. They pushed for a postponement of the mission. Scholars studied this meeting quite carefully, examining the communication failures that took place among the group members. Many people described the Challenger launch decision as a classic case of groupthink—a term that social psychologist Janis (1982) coined to describe the pressures for conformity, ardent striving for unanimity, and premature convergence that take place within many cohesive groups (Esser & Lindoerfer, 1989; Moorhead, Ference, & Neck, 1991). A well-known producer of management training materials even created a bestselling film about groupthink, which focused, in part, on the Challenger launch decision. Executives around the world participated in seminars, using this video, in which they learned how to avoid the groupthink pathology that characterized the eve-of-launch meeting at NASA in January 1986.

Ten years after the tragedy, sociologist Vaughan (1996) offered a sharp rebuke to the conventional wisdom regarding the *Challenger* accident. In her widely acclaimed book, Vaughan argued that the many antecedent conditions of groupthink, as described by Janis (1982), did not exist. For instance, the group that assembled on the midnight teleconference hardly could be described as a small cohesive in-group. It consisted of 34 individuals, some of whom did not know one another. More importantly, however, Vaughan explained that one could not understand the causes of the

catastrophe simply by studying only the specific decision, made at the eve-of-launch meeting, to launch the *Challenger* on January 28, 1986 despite the unusually cold temperatures. She argued that one had to understand the *pattern of decisions* over time that caused NASA officials to view O-ring erosion as an acceptable risk.

Vaughan (1996) described the normalization of deviance, which took place over many years. In that gradual, evolutionary process, engineers and managers moved down a dangerous slippery slope. At first, they did not expect or predict O-ring erosion on shuttle flights. However, when a small amount of erosion was discovered on an early, successful shuttle mission, engineers considered it an anomaly. Then, it happened again. Gradually, the unexpected became the expected. O-ring erosion began to occur regularly. Engineers rationalized that sufficient redundancy existed to ensure no safety-of-flight risk. Small deviations became taken for granted. Over time, however, deviations from the original specification/expectation grew. Engineers and managers expanded their view of what constituted acceptable risk. As the years unfolded, Vaughan explained that the "unexpected became the expected became the accepted" (see also Roberto, Bohmer, & Edmondson, 2006). The launch decision, therefore, could only be understood in the context of this long pattern of decisions, during which a gradual normalization of deviance took place. In short, history matters a great deal. Decisions and catastrophic failures cannot be understood without examining their historical context. When the Columbia accident occurred, the CAIB worked closely with Vaughan, drawing on her expertise to examine the historical origins of that disaster. They once again found a disturbing pattern of normalization of deviance. Moreover, they studied NASA's history to try to understand why the organization had not learned the lessons of Challenger.

From Decision Making to Sensemaking

Weick (1993) offered another important admonition to scholars of catastrophic failure, calling attention to whether or not decisions represented the appropriate unit of analysis for studies in this area. In his classic 1993 paper on the Mann Gulch wildfire disaster, Weick argued that a sensemaking perspective, rather than a decision-making lens, offered more insight as to why 13 firefighters died in that tragic incident.

According to Weick (1993), scholars need to rethink the classic linear view that people decide and then act when confronted with a particular situation. He made the case that individuals often act and then try to make sense of that action. They engage in an effort to make meaning out of the reality around them. That rationalization process compels them to make certain kinds of choices. In short, individuals often act and then decide, rather than the other way around.

At Mann Gulch, the firefighters initially viewed the situation as what they routinely termed *ten o'clock fires*,

meaning that they expected to contain the relatively small fire by 10:00 a.m. the next day. Some indications arose quickly that this blaze would be more serious than the typical ten o'clock fire. However, early actions on the part of the crew leader, Wag Dodge, as well as other crew members, seemed to confirm the initial assessment of the situation. For instance, Dodge ordered the crew to eat dinner when they landed, and then he later left the crew for a short period to eat his own supper. As members tried to make sense of those actions, they rationalized that the blaze must not be too serious—perhaps it was only a ten o'clock fire. Later, a prominent crew member stopped to take photos of the fire, while the men were digging the fire line. Again, how does one make sense of that action, despite some signals that the fire might be more dangerous than originally thought? Gradually, as the situation worsened, Weick (1993) argued that the sensemaking processes of the crew members collapsed, as it became increasingly implausible to rationalize what was taking place in a manner consistent with their original conceptualization of the fire. The firefighters became immobilized, cognitively if not physically, by their inner desire to cling to their initial categorization of the fire. Weick explained then that the key question is not the quality of decisions made by the firefighters, but their inability to socially construct a new reality as the fire progressed:

People in Mann Gulch did not face questions like where should we go, when do we take a stand, or what should our strategy be? Instead, they faced the more basic, the more frightening feeling that their old labels were no longer working. They were outstripping their past experience and were not sure either what was up or who they were. Until they develop some sense of issues like this, there is nothing to decide. (p. 636)

Weick's (1993) argument remains incredibly powerful, yet one finds it hard to distinguish or disentangle decision making from sensemaking processes in many situations. To understand the actions and behaviors that lead to catastrophic failures, one has to examine the iterative cycle of actions, sensemaking, and decisions that takes place over time. Klein's (1998) work attempts to accomplish this synthesis through his model of recognition-primed decision making. In that research, based on observations and interviews of firefighters, nurses, and naval commanders, Klein examined how people—particularly experts—engage in pattern recognition based on past experiences. In his model, a situation generates certain cues, which enable individuals to identify patterns based on past experiences. That pattern recognition process triggers a set of action scripts, which individuals assess by mentally simulating the sequence of events that will take place if they act in accordance with those scripts. What Klein described is essentially a simulated sensemaking process that takes place within the mind as one rapidly assesses an action script. Sensemaking and decision making come together inside of this mental simulation exercise in that split-second moment of intuitive decision on the part of an expert. Of course, pattern recognition processes can go astray, even for experts. After all, pattern recognition is based largely on analogical reasoning. Scholars have shown that even the most intelligent and capable experts can make mistakes when trying to reason by analogy, often because individuals focus too intently on the similarities between a current situation and a past experience, while downplaying or ignoring the differences (Neustadt & May, 1986; Gavetti & Rivkin, 2005).

From Competing Theories to Multiple, Mutually Reinforcing Lenses

Individuals typically recognize that equifinality characterizes many situations. In other words, they understand that there are many ways to arrive at the same outcome. Nevertheless, we have a natural tendency to want to play the "blame game" when catastrophic failures occur. For instance, when we witness a medical accident, we cry malpractice; we seek to blame someone for the error, rather than attributing the poor performance to external and contextual factors. Scholars have avoided this trap, to a large extent, by focusing on the systemic, cultural, and contextual conditions that make organizations susceptible to catastrophic failures. However, scholars, too, fail to embrace fully the notion of equifinality. Rather than bringing multiple theoretical perspectives to bear on a particular situation, we often enjoy pitting competing theories against one another. We try to argue that our theoretical perspective outperforms other explanations of a particular failure. Many scholars in this field have gone to great lengths to argue that one body of theory is best suited to explain a specific catastrophic failure. For instance, Vaughan (1996) spent considerable time explaining why various theories-including groupthink—do not accurately explain the causes of the Challenger accident. She argued quite persuasively that her theory of the normalization of deviance provides a more compelling explanation based on the facts of the case. Similarly, scholars often focus on a particular level of analysis-individual, group, or organizational-rather than looking at how activities at each level may interact with one another.

Some scholars, however, have shown that applying multiple conceptual lenses, as well as employing multiple levels of analysis, can be a powerful way to explore a complex organizational phenomenon. In his 1971 book, *Essence of Decision*, Allison provided a riveting explanation of the Cuban Missile Crisis, drawing on three quite distinct intellectual traditions. Yet, scholars of organizational failure often did not employ such a methodology, until two recent studies that examined complex failures both from multiple levels of analysis *and* different conceptual lenses. Snook's (2000) study of the 1994 friendly fire incident in Iraq and Roberto's (2002) study of the 1996 Mount Everest tragedy each tried to examine a failure at the individual, group, and organizational levels of analysis.

The Everest study employed behavioral decision theory at the individual level, the theory of psychological safety at

the group level (Edmondson ,1999), and normal accident theory at the organizational system level to explain why an unprecedented tragedy took place in May 1996. Snook (2000) employed a wider range of theories to explain the friendly fire accident, drawing on quite diverse conceptual lenses such as the theories of social impact, team design, and sensemaking. Both studies have one thing in common. Unlike Allison (1971), they did not present these various theories as alternative explanations for the failures. Instead, they sought to examine the linkages among the psychological and sociological forces involved at the individual, group, and organizational system level. These two studies demonstrated that multiple conceptual lenses, applied at three levels of analysis, could serve as complementary and mutually reinforcing explanations.

The Everest study provided important lessons about how the problems of cognitive bias, team psychological safety, and complex systems relate to one another and together enhance the risk of serious organizational failures. Often, scholars viewed these individual-, group-, and system-level explanations as distinct ways to explain flawed organizational strategies and outcomes. The Everest study demonstrated that an absence of team psychological safety makes it more difficult to avoid cognitive bias, because individuals do not question one another, test assumptions, and express minority views. Systematic biases in judgment become especially problematic in complex systems, because one mistake can trigger a series of other breakdowns in the system. Finally, an absence of psychological safety enhances the risk inherent in complex systems, because candid discussions do not occur about the sources of failure and the interconnections among different components of the system.

Snook's (2000) study took a slightly different, but highly fruitful, approach to multilevel analysis. After examining the tragedy at three distinct levels of analysis, he concluded that he had not yet created a complete explanation of the failure. Thus, he sought to formulate a cross-levels account of the tragedy. From that effort, he posited a new theory of organizational behavior, which he coined "practical drift." According to this theory, organizations establish rules and procedures, but individuals and units within the organization constantly seek better ways of doing things. They engage in practical actions that appear to be locally efficient. These locally efficient procedures become accepted practice and perhaps even "taken for granted" by many people. Gradually, actual practice drifts from official procedure. The drift is not a problem most of the time; but in certain unstable situations, it gets us into big trouble. Many instances of practical drift occurred in the friendly fire incident examined by Snook. For instance, official rules and procedures called for helicopter pilots to switch radio frequencies when flying from Turkey into the no-fly zone in northern Iraq. However, pilots had decided that it was more efficient, and perhaps even safer, to remain on the same frequency when flying short missions just over the border. Gradually, this commonplace technique became accepted practice and taken for granted. As pilots rotated out of the Iraqi task force and new pilots replaced them, this accepted practice, rather than the official procedure, was passed on from one group to another. Remaining on the same frequency did not cause a tragedy for over 1,000 days of the operation, but on that fateful day in April 1994, the other layers of organizational defense fell by the wayside, and the failure to change radio frequencies served as one of the causes of the catastrophe. For Snook, multiple levels of analysis proved crucial to the development of a compelling new theory, as well as a comprehensive explanation of a tragedy. Snook concluded,

I am more convinced than ever that we cannot fully capture the richness of such complex incidents by limiting ourselves to any one or even a series of isolated, within-level accounts . . . [we must] capture the dynamic, integrated nature of organizational reality. (p. 179)

FROM FAILURE TO SUCCESS: HIGH RELIABILITY ORGANIZATIONS

As researchers began to gain a better understanding of why catastrophic failures occurred, a group of scholars started to work concurrently to study complex organizations that have operated with very, very few major safety incidents for many years. Scholars coined the term HRO to describe these entities. Prominent scholars in the field include Roberts (1990), Weick (1976, 1993), La Porte, Consolini, Rochlin, and Sutcliffe (e.g., Weick & Sutcliffe, 2001). They have studied organizations such as aircraft carriers and air traffic control centers. The error rates for these organizations are remarkably low, given the hazardous conditions in which they operate. For instance, Roberts reported that the aviation safety record for pilots operating on naval aircraft carriers were amazingly low—slightly less than three fatalities per 100,000 hours of flight time. Roberts argued that HROs have managed to keep error rates very low by developing mechanisms to cope with interactive complexity and tight coupling. For instance, she found that HROs employ technical and social redundancy to reduce the likelihood of a catastrophic failure. Technical redundancy refers to components and equipment that serve as back-ups in case of failure by the frontline systems. Social redundancy refers to the processes by which individuals back up one another and check on the work of others. Besides redundancy, Roberts discovered that HROs push decision making down in the organization, to ensure that the appropriate experts apply their knowledge in critical situations. They also employ training and communication mechanisms to ensure that all individuals understand the interconnections among various subsystems and maintain updated, accurate situational awareness throughout a hazardous procedure such as the landing of a jet on an aircraft carrier.

In 2001, after roughly a decade of HRO research, Weick and Sutcliffe wrote a book titled *Managing the Unexpected*,

in which they tried to synthesize and integrate what they and others such as Roberts (1990) had learned about these complex organizations that performed very reliably in hazardous conditions. They coined the term mindfulness to describe the simultaneous existence of five key characteristics of HROs. First, HROs appeared to be preoccupied with failure of all sizes and shapes. They did not dismiss small deviations, or settle on narrow, localized explanations of these problems. Instead, they treated each small failure as a potential indication of a much larger problem. Breashears (1999), the highly accomplished mountaineer, described the preoccupation with failure that characterizes successful expeditions. He argued that many climbers focus almost exclusively on the notion of success (with success being defined as reaching the summit of one of the world's tallest mountains). These climbers think that they will enhance their odds of reaching the summit if they wall themselves off to any possible image or conception of failure. Breashears argued that this is precisely the wrong approach. Great climbers obsess with the notion of failure. They simulate failure scenarios in their heads, long before they head to a mountain. Moreover, they pay close attention to every detail, and they painstakingly assess whether a small deviation from plan might compromise the entire expedition. Organizations such as Toyota similarly have been found to obsess with failure, building organizational processes for highlighting and assessing the smallest of deviations that occur during the automobile production process.

Second, Weick and Sutcliffe (2001) argued that HROs exhibit a reluctance to simplify interpretations. In short, we all seek to simplify the complex world around us. We create categories and labels to help us cope with complexity. For the most part, this simplification process serves us well. Without it, we sometimes would find ourselves paralyzed in the face of ambiguous data and stimuli. However, we get into trouble when we fail to shed old categories and labels as contextual conditions change. In some cases, we oversimplify a situation, by trying to slap a label or category on a situation for which it does not quite fit. HROs try to maintain a healthy diversity of perspectives within the organization, and they constantly test their simplified models of reality. They build in requisite variety, particularly with regard to the diverse composition of teams, to reduce the likelihood of oversimplification or miscategorization.

Third, HROs demonstrate sensitivity to operations. They do not allow the emphasis on the big picture—strategic plans, vision statements, and so forth—to minimize the importance of frontline operations, where the real work gets done. HROs encourage the people on the frontlines to identify latent errors—those lapses in organizational defenses that do not usually cause serious negative consequences, but which might suggest system deficiencies that should be corrected, lest a large-scale failure eventually occur (Reason, 1997).

Fourth, HROs exhibit a commitment to resilience. They recognize that no hazardous and complex system will be error free. However, they develop mechanisms for catching

and recovery from small failures before they cascade through multiple subsystems of an organization. HROs have the ability to improvise when small errors occur, and they move quickly to learn from failure.

Finally, HROs ensure that expertise is tapped into at all levels of the organization. They push decision-making authority down, and they migrate decisions in real time to the location in the organization where the most relevant expertise lies. They do not let formal hierarchy, status, or power dictate decision making during times of stress. Instead, they try to ensure that people at lower levels can apply their expertise to solve thorny and urgent problems without fear of retribution from their superiors.

Taken together, these five characteristics comprise what Weick and Sutcliffe (2001) called "mindfulness." When they used the term mindful, they meant that HROs are highly attuned to the unexpected, to the ambiguous threats that emerge at all levels. They remain intellectually curious at all times, and they operate in a spirit of inquiry when faced with tough issues. In other words, they seek to open up new avenues of discussion when the unexpected occurs, rather than trying to press quickly toward a simple explanation or solution.

Critique of HRO Theory

The HRO literature has several important limitations and weaknesses. First, some scholars question the very definition of HROs. They point to Roberts' (1990) definition, in which she stated that, if an organization could have encountered catastrophic failures thousands of times but did not, then it can be described as highly reliable. These researchers suggest that a wide array of organizations fit these criteria, rendering the classification rather meaningless (Marais et al., 2004). Scholars also argue that many of the organizations studied by HRO researchers do not actually exhibit the high level of interactive complexity and the tight coupling described in Perrow's (1984) model of normal accidents (Marais et al., 2004).

A second major line of critique centers on the concept of redundancy, which is at the heart of many HRO studies. Here, scholars can point back to Perrow's (1981) original theory, in which he stressed that redundancy often can enhance the likelihood of catastrophic failure in high-risk systems because redundant features can increase either interactive complexity or tight coupling. That negative side effect holds true not only for more redundant technical systems but also for social ones. More behavioral rules and procedures can create more rigidity, that is, tight coupling. Redundant systems also can make it even more difficult for individuals to diagnose what is wrong with a complex technology. Moreover, people can become complacent, indeed overly reliant on redundant technological systems at times, as the military officers might have been in the friendly fire incident in northern Iraq. Snook (2000) also pointed out that social redundancy can be problematic, because individuals are not always acting independently—a key precondition for effective redundancy. Snook found that efforts to create social redundancy perversely led to a diffusion of responsibility and ambiguous lines of authority. As a result, the human checks and balances did not function properly. The fighter pilots' overreliance on that flawed social redundancy may have contributed to the tragedy.

Finally, the HRO literature has been criticized because it appears to be arguing that increased vigilance lies at the heart of all efforts to increase safety. In short, are we simply asking organizations to be more careful? HRO scholars have identified some key attributes of organizations that are highly attuned to safety considerations, but more work could be done to identify the concrete mechanisms and processes that organizations can put into practice to increase safety. How precisely do I become more careful? How do we move from individual care to organizational vigilance? Second, and perhaps more importantly, some scholars have questioned whether HRO scholars have given due consideration to the trade-off between safety and other organizational goals and objectives. Marais et al. (2004) pointed out, for instance, that aircraft carriers operating during peacetime have safety as a primary goal, given that they are simply running training missions. At the end of the day, the objective is to return each pilot safety to the deck of the ship, not to hit enemy targets, and so forth. Few thorny trade-offs between safety and other objectives exist during peacetime operations, which is when HRO scholars studied aircraft carrier operations.

FUTURE DIRECTIONS

While this chapter clearly illustrates that we have learned a great deal about the causes of catastrophic failures, more work needs to be done to help us understand how such accidents can be prevented. The HRO literature has made substantial strides in this area, but it has some limitations. The following questions remains: How does an organization become "preoccupied with failure" and without completely sacrificing its other goals and objectives? If organizations become attuned to all the ambiguous signals or threats that arise, will they ever get any of their work done? Can a company serve customers and make reasonable profits if it is constantly sounding alarms about subtle and weak signals of potential safety or quality issues?

Recent studies have begun to explore these questions. One promising line of inquiry involves the study of rapid response teams in health care organizations (Buist et al., 2002; Park ,2006; Roberto et al., 2006). Many hospitals have begun to implement a process for amplifying and exploring weak signals. When "code blues" occurred in hospitals in the past (i.e., crisis teams responding to a patient experiencing cardiac arrest), staff members often noted that the patients' conditions had been deteriorating for several hours prior to the code. However, frontline staff members—typically nurses—often did not voice their concerns to those with more status and formal authority in the organi-

zation (e.g., surgeons). Researchers found that several early warning signs tended to precede unexpected cardiac arrests. In some cases, these pieces of data were quantifiable, that is, acute changes in respiratory rate or oxygen saturation. In other instances, nurses might simply notice a shift in the patient's appearance, cognitive ability, or demeanor.

Hospitals have now created lists of these early warning signs, and they have empowered nurses to call in a rapid response team—if they see one of these warning signals—to help them assess the significance of these ambiguous threats. Hospitals often describe this process as "calling a trigger"-meaning that frontline staffers are identifying a small problem that may trigger a serious incident in the near future. These rapid response teams are cross-disciplinary groups that are highly skilled at quickly assessing whether a warning sign merits further action. This rapid response process enables and empowers inexperienced nurses to speak up when something does not look right. Many hospitals have reported substantial decreases in the number of code blues after implementing rapid response teams. They have also reported that many other improvement ideas have emerged from this process, even in instances when the threats did not prove to be real. Perhaps most importantly, the benefits of these new rapid response teams easily outweigh the costs, and they do not appear to interfere unnecessarily with the care of other healthier patients.

Why do these rapid response teams increase preoccupation with failure and enhance patient safety without unduly increasing costs or sacrificing other organizational goals and objectives (e.g., profit maximization)? Here, we must go back to the concept of shared cognition, which is at the heart of the HRO literature. Individuals and groups working in HROs build a strong sense of shared situational awareness, as well as a strong sense of system awareness. They understand how situations are unfolding, how their work relates to that done by others, and how the human and technical systems function. Bigley and Roberts (2001) pointed out that HROs constantly update these cognitive representations of a complex reality, processing real-time information very quickly to maintain a current shared picture of a hazardous situation.

To understand how rapid response teams enhance mindfulness without unduly burdening the organization with excess costs, we have to bring together two streams of work: the HRO scholars' work on mindfulness and Klein's (1998) work on pattern recognition. Recall that Klein showed how expert decision makers discern patterns very quickly based on past experience, and this pattern recognition triggers action scripts. One can argue that rapid response teams build individual as well as shared pattern recognition capabilities within the organization. They are a concrete mechanism for not only surfacing weak signals, but also rapidly and inexpensively evaluating those signals and refining the diagnosis of those signals over time.

As experts interact with frontline employees and constantly react to weak signals, they may become better and

better at recognizing patterns—as individuals, as teams, and as an entire organization. First, people may become better at identifying the subtle, nonquantifiable signals of future harm. In particular, as experts interact with novices, they help develop the pattern recognition capabilities of newer, inexperienced frontline employees. Consequently, novices get better at spotting weak signals, and perhaps spot them earlier as well. Novices get better, in particular, when the warning signs are nonquantifiable—for example, when the patient's appearance has simply changed without alterations in his or her vital signs. Second, people may begin to develop a stronger capability to discern which signals are real and which are merely "false alarms." In the long run, that will reduce the number of triggers that are called for nonserious situations. Third, people may learn how to assess the validity of a weak signal more quickly, thereby reducing the time associated with each deployment of a rapid response team. Finally, people begin to see patterns that cut across the organization; that is, these types of patients tend to experience triggers for this specific set of reasons—we need to be proactively attentive to those situations. The organization can then move from simply being reactive—responding to weak signals after they arise—toward a more proactive orientation in which they seek out the situations in which signals are more likely to arise and accidents are more likely to occur. That proactive approach cannot only improve patient safety, but it also may reduce costs, as it becomes more expensive to treat a patient if their condition deteriorates.

More work certainly needs to be done to develop our understanding of the concrete mechanisms by which organizations become more mindful without sacrificing other goals and objectives. The rapid response teamwork represents one promising line of inquiry; many others surely exist. For instance, in a 1999 article, Spear and Bowen examined the inner workings of the Toyota Production System. Toyota represents an organization that is extremely preoccupied with small failures. Without question, they are an auto industry leader in terms of quality. However, they also have one of the highest levels of productivity in the industry. They appear to have developed a system whereby reliability is enhanced without sacrificing cost efficiency.

As scholars continue to study catastrophic failure, they should take heart from the recent work that has been done in the health care field as well as on the *Columbia* shuttle accident. Hospitals around the world are trying to learn from the literature discussed in this chapter. Similarly, the *Columbia* accident investigators reached out to scholars such as Vaughan (1996) and Weick (1976, 1993) to understand what went wrong at NASA. In both instances, we see practitioners seeking out scholars to help them understand the organizational causes of accidents and the potential prescriptions for reducing the risk of catastrophic failures. Research appears to be impacting practice, and rapid advances in practice are informing new theory development. That synergy between scholarship and practice promises to be much fruit in the years ahead.

REFERENCES AND FURTHER READINGS

- Allison, G. T. (1971). The essence of decision: Explaining the Cuban missile crisis. Boston: Little, Brown.
- Bigley, G., & Roberts, K. (2001). The incident command system: High reliability organizing for complex and volatile task environments. *Academy of Management Journal*, 44(6), 1281–1299.
- Breashears, D. (1999). *High exposure: An enduring passion* for Everest and unforgiving places. New York: Simon & Schuster.
- Buist, M., Moore, G., Bernard, S., Waxman, B., Anderson, J., & Nguyen, T. (2002). Effects of a medical emergency team on reduction of incidence of and mortality from unexpected cardiac arrests in hospital: Preliminary study. *British Medical Journal*, 324(7334), 387–390.
- Columbia Accident Investigation Board. (2003, August 26). Columbia accident investigation board report. Washington, DC: Author.
- Deal, D. W. (2004). Beyond the widget: Columbia accident lessons affirmed. *Air and Space Power Journal*, 18(2), 31–50.
- Edmondson, A. (1996). Learning from mistakes is easier said than done: Group and organizational influences on the detection and correction of human error. *Journal of Applied Behavioral Sciences*, 32(1), 5–32.
- Edmondson, A. (1999). Psychological safety and learning behavior in work teams. *Administrative Science Quarterly*, 44(4), 350–383.
- Esser, J., & Lindoerfer, J. (1989). Groupthink and the space shuttle challenger accident: Toward a quantitative case analysis. *Journal of Behavioral Decision Making*, 2(3), 167–177.
- Gavetti, G., Levinthal, D., & Rivkin, J. (2005). Strategy-making in novel and complex worlds: The power of analogy. *Strategic Management Journal*, 26(8), 691–712.
- Gavetti, G., & Rivkin, J. W. (2005). How strategists really think: Tapping the power of analogy. *Harvard Business Review*, 83(4), 54–63.
- Janis, I. L. (1982). Groupthink: Psychological studies of policy decisions and fiascos (2nd ed.). Boston: Houghton Mifflin.
- Klein, G. A. (1998). Sources of power: How people make decisions. Cambridge, MA: MIT Press.
- Marais, K., Dulac, N., & Leveson, N. (2004, March 24). Beyond normal accidents and high reliability organizations: The need for an alternative approach to safety in complex systems. MIT Engineering Systems Division Symposium. Retrieved September 11, 2007, from http://esd.mit.edu/staging/sympo sium/pdfs/papers/marais-b.pdf
- Moorhead, G., Ference, R., & Neck, C. (1991). Group decision fiascos continue: Space shuttle Challenger a revised groupthink framework. *Human Relations*, 44(6), 539–550.

- Neustadt, R. E., & May, E. R. (1986). *Thinking in time: The uses of history for decision-makers*. New York: Free Press.
- Park, J. (2006). Making rapid response real: Change management and organizational learning in critical patient care. Unpublished doctoral thesis, Harvard University, Cambridge, MA.
- Perrow, C. (1981). Normal accident at Three Mile Island. *Society*, 18(5), 17–26.
- Perrow, C. (1984). Normal accidents. New York: Basic Books.
- Reason, J. T. (1997). Managing the risks of organizational accidents. Aldershof, UK: Ashgate.
- Roberto, M. A. (2002). Lessons from Everest: The interaction of cognitive bias, psychological safety, and system complexity. *California Management Review*, 45(1), 136–158.
- Roberto, M. (2005). Why great leaders don't take yes for an answer: Managing for conflict and consensus. Upper Saddle River, NJ: Wharton School Publishing.
- Roberto, M., Bohmer, R., & Edmondson, A. (2006). Facing ambiguous threats. *Harvard Business Review*, 84(11), 106–113.
- Roberts, K. (1990). Managing high reliability organizations. *California Management Review*, 32(4), 101–113.
- Russo, J. E., & Schoemaker, P. (1989). *Decision traps: Ten barriers to brilliant decision-making and how to overcome them.*New York: Doubleday.
- Snook, S. A. (2000). Friendly fire: The accidental shootdown of U.S. Black Hawks over northern Iraq. Princeton, NJ: Princeton University Press.
- Spear, S., & Bowen, K. (1999, September/October). Decoding the Toyota production system. *Harvard Business Review*, 77(5), 96–106.
- Starbuck, W., & Farjoun, M. (2005). Organization at the limit: Lessons from the Columbia disaster. London: Blackwell.
- Turner, B. (1978). Man-made disasters. London: Wykeham.
- Useem, M. (1998). The leadership moment: Nine true stories of triumph and disaster and their lessons for us all. New York: Random House.
- Vaughn, D. (1996). *The Challenger launch decision: Risky tech-nology, culture, and deviance at NASA*. Chicago: University of Chicago Press.
- Weick, K. (1976). Educational organizations as loosely coupled systems. *Administrative Science Quarterly*, 21(1), 1–19.
- Weick, K. (1993). The collapse of sensemaking in organizations: The Mann Gulch Disaster. *Administrative Science Quarterly*. 38(4), 628–652.
- Weick, K., & Sutcliffe, K. (2001). *Managing the unexpected*. San Francisco: Jossey Bass.

PART XV

Non-Business Organizations: New Perspectives

ARTS MANAGEMENT ISSUES IN THE 21ST CENTURY

DAVID CRAY

Carleton University, Ottawa, Canada

LORETTA INGLIS

Monash University, Melbourne, Australia

rts management is a relatively new field in management research but one that is attracting increasing attention. At one level—the most predominant thus far—arts management is concerned with the activities of organizations such as museums, galleries, orchestras, dance and theater companies, opera houses, and groups promoting the arts in culture. Researchers and practitioners are concerned with the structure of these organizations, the way they acquire resources, and how they expend them. In addition, the types of programming offered by various arts bodies, how they are selected, and how they are received by the public have been subjects of study. As we will see in the following discussion, all of these issues are being influenced by environmental changes affecting the arts community.

In addition to work at the organizational level, the activities of individual managers within arts organizations have come under increased scrutiny. While the popular view often features the heroic figure of a conductor or director, in fact, responsibility for much of the success of any arts institution rests on the work of administrators who handle marketing, sales, logistics, finances, human resources, and all the other necessary support functions. Each of these functions has its equivalent in the private sector but still must be adapted to the arts milieu. For example, human resources must often deal with high profile performers

who appear with the company for a short time under quite specific constraints. Within any arts organization, a balance exists between administrative requirements, some of which may be imposed by outside bodies, and the aesthetic judgments inherent in presenting performances or exhibitions. How the relevant managers resolve these tensions has become a major topic in the study of arts management.

One reason for increasing interest in arts management is the considerable growth of the arts industry both in its own right and as an important element in marketing cultural resources. As arts organizations undertake larger and more ambitious programs, the variety and degree of managerial skills required for success increases. A second cause for examining arts management stems from the decline of government subsidies for the arts. Although the level of government funding varies widely, the percentage of support coming from government bodies has generally decreased leading to greater reliance on revenue from admissions and sales, corporate support, and fundraising efforts. Even where government funding is available, competition for these funds has sharpened considerably. Increased difficulties in securing necessary resources means that arts organizations must operate more efficiently thus making greater demands on their managers. While the first two factors affect virtually all arts organizations, a third, increasing internationalization, mainly concerns larger institutions. The need to present high-quality work has increased interaction among arts organizations around the world. Whether it is an exhibition of a prominent artist drawing on the collections of numerous museums or a tour by a dance company spanning several countries, greater coordination in marketing and logistics demands higher levels of management skill and program integration than purely domestic endeavors.

Despite this increasing interest in management issues in arts communities, there is relatively little solid work to draw upon. Those who are engaged in managing arts organizations or who staff agencies that provide them with resources write much of what is available. While this work is valuable in describing current practice, it seldom proceeds from a coherent theoretical base thus making its application across a broad spectrum difficult. One area that has made a major contribution to the literature on arts management is that centered on not-for-profit (NFP) organizations. Many smaller arts organizations are nonprofit both by design and circumstance and thus have attracted attention from those interested in this area. The issues of governance, leadership, volunteerism, and, more recently, marketing have all been investigated from this perspective, though little of this work is directed toward arts organizations, per se.

One of the key issues in the arts as well as in the larger NFP arena concerns increasing pressures to adopt standard management practices. Concerns with efficiency and effectiveness along with the demands of funding agencies and donors for more coherent and transparent procedures have convinced many arts organizations to initiate reforms in their administrative apparatus. Such moves have encountered resistance from the managers themselves as well as other stakeholders (Sicca & Zan, 2005). Many participants, especially volunteers, fear that more emphasis on managerial processes will detract from the original goals of the organization. A common complaint is that preparing and administering grant proposals uses managers' time and energy that they might better spend on program delivery. Similarly, placing an emphasis on moneymaking exhibitions rules out more speculative programs featuring unknown artists or experimental presentations. Although all but the smallest arts organizations recognize the need for more professional management, many are uncomfortable with the consequences of this shift. Even larger organizations that have successfully adopted more managerial approaches regularly decry the compromises they have had to make.

But is arts management really that different from management in other types of organization; are the challenges found in the arts industry and the context in which they operate specific enough to require a separate approach to understanding managerial experience? From the limited literature available, the answers to this question appear to be *yes*, *no*, and *yes*. The first answer is affirmative because the arts as an industry have their own set of drivers and constraints just as banking, automobiles, and telecommunications do. Indeed, one might argue that the context is even more distinctive since the products offered by the arts are more discretionary than those offered by banks, car

companies, or telephone systems. Attracting and retaining audiences has always been among the most important concerns for the arts.

The answer to the question is *no* to the extent that management functions in the arts mimic those in other industrial sectors. While marketing normally receives the most emphasis in the arts, finance, accounting, human resources, information systems, and operations and logistics all demand attention. To the extent that standard techniques can be applied to the issues found in the arts, little difference in management behavior exists., Even this conclusion, however, has only limited validity. To take but one example, the difficulties inherent in moving valuable and fragile objects that are basically irreplaceable have given rise to specialty firms in arts logistics. The basic function of delivering the appropriate goods to the correct place on time is complicated by specific problems of insurance, security, and preservation.

Finally, arts management is unlike that in other industries because the goods—or more accurately the experiences—it offers have distinct characteristics. Even where there may be a permanent record of the experience—for example, a recording of a symphony or a copy of a print—the main purpose of arts organizations is to provide a time-limited exposure to a work of art. The value to the consumer is the impression of the moment and the memories that remain. This makes demands on the institution that are quite different than those required to produce a bicycle or sell an insurance policy. The resistance of some arts organizations to more managerial modes of operation stems, at least in part, from the recognition that ignoring these differences will undermine the mission of their organization.

ISSUES IN ARTS MANAGEMENT

As the field of arts management begins to develop, a wide range of issues from both policy and technical points of view has emerged. In the bulk of this entry, we will discuss several topics which have attracted attention from theorists and practitioners alike. Some of these, such as marketing, have already generated a fair amount of work. Others, such as the role of volunteers, are just coming into focus. Still others, including strategy and decision making, have received considerable attention from management researchers but have not yet been applied to arts management.

One of the themes that emerges from this discussion is the contrast between smaller, community-based arts organizations and their larger, more professionalized counterparts. All industries include a range of entities from large to small, but the distribution in the arts weighs heavily in favor of smaller organizations built on the ambitions of like-minded enthusiasts. Although their budgets are often miniscule and their programs limited, they play an important role in the industry by providing a training ground for artists and a venue for patrons and by bringing arts to the local community. A substantial gap normally exists between large and

small arts institutions so that the smaller, community-based operations seldom evolve into large, complex structures. It is important, therefore, to distinguish between the problems and solutions available to each category.

As with any industry, a myriad of managerial issues exists that may be addressed. In arts management, the material available even for topics of central importance limits us. Keeping these constraints in mind, we will address the following issues in the remainder of this chapter: stakeholders, leadership, governance, strategy and decision making, and marketing and volunteers.

Arts Organizations and Their Stakeholders

One way to understand arts organizations, both on their own terms and in contrast to other types of organizations, is to examine key stakeholders. Any organization has contact with various groups that have some claim on their functions and resources. The claims may be direct, as in the case of employees or customers, or indirect, as in the local political structure, which may benefit from the presence of such an institution. While all stakeholders normally benefit from the organization's success, each gains in a different way. This can lead to conflicting demands for the allocation of resources and efforts. This type of conflict is not necessarily more acute in arts organizations than it is in hospitals, for example, but it does have some characteristics that are distinctive and that lead to specific management issues. In other words, the collective characteristics of stakeholders make demands that require distinctive adaptations by managers in arts organizations (Rentschler, 2002).

For many organizations, the board of directors or its equivalent is an important stakeholder, but in arts organizations, the board's composition and its role often have quite distinct features. In most organizations, the board functions as a representative body with specific oversight functions. Some boards try to balance the claims of various stakeholders, but others are dominated by one or more interest groups. The degree to which the board acts in one or the other of these capacities will have a considerable impact on the manager's role in the organization. Where the top managers and the board share goals—in effect acting as a single, coherent stakeholder-the competing demands of other stakeholders will be diminished, if not dismissed. Where division replaces cohesion, we can expect greater levels of competition for resources and, hence, greater conflict. The function of boards in arts organizations is complicated by the presence of members who belong to other stakeholder groups such as artists, funding agencies, patrons, donors, and volunteers. This type of representation may further complicate the role of the organization's top managers.

Another important stakeholder group in arts organizations consists of those who consume their products. As funding in the arts industry has become less dependent on government, its reliance on fee-paying customers has increased, potentially handing them more influence as stakeholders. The arts industry is unusual in that an overlap often exists among the most important consumers and major financial contributors through donations or fundraising. This higher profile often earns such individuals seats on the board either in their own right or as representatives of larger groups of consumers. Of course, commercial organizations give more weight to the opinions of their larger customers, but the integration of a specific class of consumers into the administrative structure characteristic of arts organizations provides a distinct challenge for managers, especially those at lower levels where a patron may be at once a customer and part of the top management team. Large, professional arts organizations focus much of their time and attention on this class of consumers. For smaller, community-based arts organizations, a three-way overlap may exist among consumers, managers, and funders, as the most enthusiastic supporters serve simultaneously as directors, clients, and donors. These organizations almost guarantee internal alignment, but response to external changes is likely to be slow.

Though government-funding agencies have become less important contributors to the arts, they still occupy an important place among stakeholders. In many jurisdictions, governments at various levels are still the single biggest source of cash, providing the funding base on which arts organizations build their budgets. They also, directly or through their agencies, provide support for specific projects. As stakeholders, the various funding agencies generally demand higher levels of transparency than in the past. Much of this is framed in terms taken directly from commercial organizations (Sicca & Zan, 2005) with their emphasis on efficiency and rational decision making. In many jurisdictions, governments are pushing arts organizations to become more entrepreneurial in order to aid economic development (Burton, 2003). This implies that government investment must be justified more in terms of economic return than cultural relevance. Somewhat of a paradox exists here: As governmental bodies have become less generous, they have also become more demanding in terms of business plans and governance procedures. This, in turn, has contributed to the perceived need for greater professionalism among managers in arts organizations.

While many of the stakeholders discussed so far have their counterparts in profit-seeking organizations, NFP groups have an additional constituency—volunteer workers—which is virtually unknown among commercial organizations. Volunteers receive a number of benefits from their association with the arts: a sense of belonging, contact with artists, pride in the organization and its achievements, or simply the social contact that it provides. Where volunteers play an important role as an unpaid workforce, they may have considerable influence over policy. Volunteers are generally seen as a conservative force in NFP organizations since the benefits they derive are defined by the current status of the institution. Any change, especially a radical or controversial one, threatens that connection. The needs of

volunteers can have a significant effect on the roles played by top-level managers.

The stakeholder group that most distinguishes arts organizations consists of artists (we include performers in this term). All stakeholders have specific interests, but artists often express their concerns not only as a distinct agenda but also through an alternative logic of evaluation. The needs of most stakeholders can be met by fulfilling organizational commitments, whether this is in terms of financial success, operational outcomes, or social functions. These concerns often affect artists; they wish to have their work purchased or to stage a particular production. At the same time, many of these needs invoke aesthetic criteria, which cannot be clearly articulated and on which considerable disagreement often exists. With limited resources, what type of painting should a museum collect? What operas should be staged? Obviously, these questions, while important to other stakeholders, are crucial to the artists concerned. Top managers, such as program directors or curators, can address these issues either by advocating for one particular view or by attempting to balance competing claims. However they choose to approach these decisions, there is an additional set of criteria that is often far from clear cut and yet impinges heavily on their deliberations.

The stakeholders for arts organizations may include other groups such as financial institutions, professional associations, and unions, but those mentioned earlier are normally the most important in shaping managerial roles. We base our contention that managers in arts organizations face distinctive challenges on two characteristics of their stakeholder base. First, individuals' motives for attachment to arts institutions are more diverse than that for most organizations, especially the commercial firms now held up as models of efficient operation. Second, the agendas prosecuted by these groups are often not only contradictory but also invoke criteria that are not comparable. If we add the potential overlap of some stakeholder groups (e.g., patrons with boards, volunteers with artists), the complexity of the arts manager's task becomes clear.

Leadership

Given the changing environment of the arts industry and the variety of stakeholders engaged, the role of leader is crucial to the organization's success. Within the limited literature on arts management, the topic of leadership has been among the more prominent. Part of this work has focused not on the individuals or groups who lead specific organizations but on the leadership roles taken by organizations as a whole. Typically, such work has identified institutions that have broken ground either in the specific programs offered—for example, an innovative series linking poetry with music—or through new approaches to operational issues. The latter has often focused on specific ventures in fundraising or marketing, as these are crucial functions, especially for the large, professional arts institutions. Since

these articles are aimed at describing successful (or not) innovations, they have little theoretical content. Their existence, however, illustrates their importance as models for managers in other arts organizations of all sizes.

In terms of leadership in arts organizations at the individual level, two main questions are posed: Who leads and how do they lead? The first issue stems from the dual rationalities that influence decision making in arts organizations. The tension between operational and financial realities and aesthetic or artistic concerns exists in all arts organizations, and finding one individual with the right mix of qualifications and skills is difficult. In smaller groups, a single individual usually handles these demands by attempting to balance competing claims. In larger organizations, the same solution may apply, but more frequently, an individual in a leadership role represents each of the separate streams. For example, the conductor of an orchestra may choose the repertoire, select the soloists, and decide how much practice time is devoted to each piece. At the same time, the general manager decides how to market the program, what the budget will be for each performance, and the type of support staff required. A successful performance cannot be mounted without both fulfilling their roles. This may lead to conflict, but it does allow a clear division of tasks aligned with individuals' interests, skills, and qualifications (Voogt, 2006).

In some arts organizations, the equivalence of the artistic and administrative functions is institutionalized. The two positions have equal weight and report separately to the board or some other higher authority. In other institutions, one or the other has greater official power. In either case, the two must arrive at some arrangement that allows for the fulfillment of both functions. Historically, the artistic or aesthetic director had predominated and it was up to the administrative head to provide the resources to support this artistic vision. Late in the 20th century, however, the decline, and even bankruptcy, of numerous arts organizations placed greater focus on the prudent employment of available resources. Finley, Gralen, and Fichtner (2006) provided an interesting example of this transition in a Canadian orchestra. They observed, however, that it was not only a shift to a more managerial approach that reinvigorated the group, but also the reengagement of many of its stakeholders. The dual leadership role found in so many arts organizations is not simply a grudging concession to administrative pressures but a reflection of changing demands from stakeholders.

Whatever leadership arrangements are adopted, individual leaders may enact them in different ways. The literature on leadership includes descriptions of numerous styles found under various circumstances (Yukl, 2006). Table 97.1 outlines four of the most common styles along with their applicability to arts organizations. Charismatic leadership relies heavily on the vision of a single individual who is able to convince others, using their personal characteristics, to follow the leader's dictates. Often, myths grow

Table 97.1	Leadership Styles	eadership Styles					
Style	Characteristics	Strengths	Weaknesses	Applicability			
Charismatic	Single leader who relies on personal attributes	Promotes commitment; overriding vision	Generates dependency; success depends heavily on leader	New, small arts bodies; organizations in crisis			
Transactional	Leader-follower relationship based on mutual benefits	Leadership is routinized; transition between leaders is less disruptive	Followers become calculative in their commitments	Found in large state- supported arts institutions; those run by civil servants			
Transformational	Leader inspires followers to move beyond self-interest	Focuses on the organization's immediate problems	Concentrates on the leader but may ignore situational issues	Arts organizations requiring significant change			
Participatory	Leader involves others in decision making and other leadership roles	Promotes a sense of belonging; speeds implementation	Slows decision making and other processes	Found in smaller arts organizations with few hierarchical levels			

around such leaders, providing a compelling narrative for both those within the organization and new recruits (Ropo & Sauer, 2007). This style tends to be unstable since the failure or disappearance of the leader leaves a huge void in the organization with no easy succession. The charismatic style is appropriate for new organizations with a passionate founder as leader. It also emerges when organizations are in crisis and require a strong, single-minded individual to override internal divisions. Both of these situations are common in the arts organization.

The transactional style of leadership depends on an exchange relationship between leaders and followers. Both expect to gain from the arrangement. This is a common style of leadership in large organizations governed by routine. In terms of the arts, institutions that have secure funding and a well-accepted mission are most likely to exhibit this style. Museums and performing arts companies supported by the state often fit this prototype although other, older organizations may feature it as well.

Organizations require transformational leadership when experiencing significant changes. The transformational leader convinces his or her followers that, for the sake of the organization, they must look beyond their own interests. Transformational leadership differs from charismatic leadership in that the focus is not so much on the leader's personality but on the problems that the organization faces. One can easily see this leadership style is applicable in arts organizations where constant change in programming or internal structures is necessary to meet a shifting environment.

The final leadership style, participatory, tends to be found in smaller organizations with fewer hierarchical levels. This style, which stresses the involvement of managers and lower level participants in decision making and implementation, can often be found in smaller arts organizations where choices of program are consensual rather than directive. Arts organizations that rely heavily on volunteers in administrative roles often select leaders with a participatory style, in part because of the general ethos, but also because

no single individual has the time to manage all aspects of the organization. The normal shift to a transactional style makes the transition between voluntary and more professionalized structures difficult. Volunteers are unused to a directive style and resent the loss of influence inherent in the participatory style.

Which style an organization's leader will exhibit depends on the individual's personality and the preferences of those who make the appointment. The match between the organization's requirements and the leader's style, however, will affect the leader's success. A transformational leader would disrupt a large, stable organization—for example, a state art museum—to no purpose. Similarly, a small volunteer dance company would likely find a transactional leader insufficiently motivating. Some evidence exists that arts organizations, especially larger ones, have developed a greater awareness of the appropriate leadership skills, but history, personal connections, and artistic reputation still play the predominant role in the selection of most leaders in the arts.

Governance

The governance structures in which leaders operate heavily influence the roles that they play in their organizations. The NFP literature distinguishes between governance and management, defining the board's role as setting overall policies while management is concerned with the day-to-day running of the organization within the guidelines set by the board. Much of the literature, however, indicates that, in reality, power and responsibility are not divided so neatly. Bradshaw, Murray, and Wolpin's (1992) study of NFP boards recognized four distinct patterns of governance: CEO-dominant, board-dominant, staff-dominant, and collective governance. The most common pattern in larger and well-established NFP organizations is CEO-dominant governance, in which the board simply ratifies the decisions made by the CEO. Smaller and newer NFPs,

especially those driven by volunteers, are more likely to have board-dominant governance, with the CEO providing information and support only. Staff-dominant governance is evident in professional bureaucracies such as hospitals, while collective governance, in which consensus is the ideal, is observed in self-help or advocacy NFPs.

Within the arts community, several factors impact on the form of governance adopted and the role the leader(s) play in running the organization. Throughout history, the head of the artistic side of the organization, the conductor, head curator, or chief choreographer has played the most visible role, with the board providing support rather than oversight. This is especially true in larger, older organizations. However, when the institution employs a variety of artists, the administrative head of the organization may gain ascendance over the artistic director. An interesting example of this can be seen in Joseph Volpe's long career as General Manager of the Metropolitan Opera in New York City. Although James Levine, as the principal conductor, wielded considerable influence, the variety and complexity of the company's productions meant that the continuity provided by Volpe as administrative head was crucial.

In organizations where the staff dominates governance structures, where the CEO tends to coordinate experts rather than direct his or her immediate subordinates, varieties of specific expertise are applied to diverse functions. Thus, in large museums, which normally cover multiple areas or periods, specialists with detailed knowledge advise the CEO on acquisitions, displays, and exhibitions. It would be difficult, if not impossible, for the CEO or the board to make such decisions without significant input from managers at this level.

Smaller arts groups are generally run by a collective, either at the board level or stretching down through multiple layers. Which form of governance is adopted is influenced by the age of the organization, its mission, and, occasionally, by legal requirements. A board containing many of those most committed to the cause often governs newer organizations. As functions become routinized, this may shift to a collective form, especially if there is specific personal commitment to the organization's mission. For example, an artists' cooperative, once established, might well adopt a collective form of governance. Legal considerations may influence governance structures when questions of responsibility or liability arise. Even though the governance structure will be shaped by the organization's mission, age, and size, it will also interact with the leader's style. Different styles of leadership fit with specific models of governance. As the organization evolves and its circumstances change, the two interact, sometimes going through a period of conflict, before reaching equilibrium.

Strategy and Decision Making

One of the key functions of both individual leaders and boards is making decisions concerning the strategic direction of the organization. The volume of research on types of strategies and their determinants and execution is large and expanding; however, relatively little of this work has addressed the concerns of arts organizations. In one sense, this is understandable since smaller arts organizations, and even some of the larger ones, tend to react to emerging conditions rather than develop long-term plans. Smaller organizations tend to lack the resources for the requisite analysis and larger ones often do not see the need. With increasing financial pressures, many arts organizations are taking a more proactive view in planning future efforts. This not only provides consistent direction but also sets out interim goals. Arts funding bodies now want to know how a particular project fits with long-term goals before providing the necessary resources. These two developments are leading to more active strategic planning and more research into the area.

In the performing arts, programming comprises a set of decisions that is crucial not only to the success of the organization itself, but also to writers, creators, performers, and companies whose careers depend on these choices. A recent study of programming decisions in French theaters indicated that less than one-third were made with strategic goals in mind (Assassi, 2007). Others were influenced more by the reputation or availability of those involved. Even in the cases where strategy was a consideration, it was not clear whether the choice was part of a comprehensive plan or was simply based on the shape of a particular season. This study points to two important issues in applying strategic analysis to arts organizations. First, it would be very useful to know to what extent decision makers rely on strategy to guide their choices. This would depend, obviously, on whether such a strategy had been articulated and accepted. Second, this study poses the question of how arts organizations make strategic decisions. The various combinations of leadership roles and governance structures previously described allocate the power for making decisions to various individuals and groups. An understanding of the mechanisms actually used in making important decisions would allow comparisons among arts groups of different sizes and complexities as well as facilitate comparisons across artistic and national cultures.

A number of models for strategic decision making have been proposed over the years, but four have gained prominence. The rational model implies that possible alternatives are evaluated through a given set of criteria such as audience appeal, cost of installation, or availability of performers. The choice that ranks highest will be selected. The political model sees decision making as a bargaining or negotiation process among groups with varied interests and power bases whereby the final selection is determined by trade-offs among those involved. In incremental decision making, strategies emerge not as the result of a long-term vision but as the residue of numerous small choices made over a time. Organizations which employ this approach rarely make significant or abrupt changes of direction. The

garbage can model of decision making sees both solutions and problems existing simultaneously. A strategic decision is made when an internal or external opportunity links an existing solution with a problem (Cray, Inglis, & Freeman, 2007).

A small study applying these models to arts organizations discovered examples of all but the incremental approach (Cray, Inglis, & Freeman, 2006). The models seem to fit processes in arts organizations as one would predict. For example, a state-funded museum used a political process when adopting a program that would make some of its holdings available to regional museums around the country. A local music group built on the success of its annual festival to champion the building of a dedicated music facility. Since the need for this facility had existed for some time, this was an excellent example of the garbage can model. As these were operational rather than aesthetic decisions, it is not surprising that they fit models developed for other types of organizations. Where aesthetic concerns were involved—for example, in the planning of an orchestra's annual program—a second set of criteria were added to the rational model. Along with considerations of budget, logistics, and audience appeal, the conductor's personal preferences concerning the works were an important consideration. The orchestra's manager expressed one set of criteria while the conductor expressed another, in line with the dual-leadership model mentioned above. This research suggests that standard forms of strategic decision making apply to arts organizations, but with significant modifications when artistic issues are concerned.

Marketing

For most arts organizations, marketing was the first managerial function to professionalize. As early as the 1970s, managers recognized that increased competition from other forms of entertainment required more structured and aggressive marketing techniques. For larger organizations, this eventually led to the establishment of marketing departments and integrated marketing strategies. The decline of government funding in the 1980s and 90s as well as the emergence of electronic marketplaces that required specialized technical expertise hastened these developments. More recently, an emphasis on creative entrepreneurial marketing approaches that seek to differentiate a specific arts organization from others in its field has emerged (Fillis, 2004).

In becoming more professionalized and more integrated within the strategic framework of the organization, arts marketers have drawn on developments from mainstream marketing. The most prominent of these now is relationship marketing. As arts organizations have become more dependent on income from exhibitions and performances, there has been a shift away from attracting customers to specific events and toward establishing an ongoing connection between the institution and the individual (Rentschler, Radbourne, Carr, & Rickard, 2002). It is not enough to attract a patron to a performance of *Faust*; the object is to

convert an occasional customer to a continuing supporter of the organization as a whole.

One mechanism for developing a continuing relationship with patrons is through various forms of "friendship" programs (Bussell & Forbes, 2006). These programs show some characteristics of loyalty programs in that they offer discounts and privileged access to certain events. However, they go beyond loyalty programs, which aim mainly at ensuring continuing consumption, by fostering separate organizations, usually operated by their members, whose goal is to support a specific institution or the arts in a certain region. In addition to the support they provide for a particular institution, such a group offers social benefits to its members, which helps make the organization a focal point in their lives. Many friends' organizations include volunteer and fundraising activities, which further involve participants. Another aspect of relationship marketing focuses on contact with principals of the organization. Select individuals, including important donors, energetic volunteers, and others who make a significant contribution, attend functions with performers, directors, composers, and upper level managers. Creating this type of personal connection has long been standard practice for important donors, but the application of relationship marketing techniques has expanded and routinized the practice.

One of the main reasons that arts organizations have emphasized their marketing efforts has been changes in government funding. As Lee (2005) argued, it is not a decline in government funding (which in some cases has actually increased) that has altered the face of arts marketing but rather the shift to a market driven allocation of resources. Arts organizations can no longer claim public support simply because their efforts are innovative or of high quality; they must demonstrate that there is an audience for their efforts. This may involve contributing to social functions such as education or demonstrating commercial value by drawing in tourists from other areas. This changes not only the marketing focus but also its intent. Arts marketing often has the dual intent of bringing in patrons and, at the same time, assuring funding agencies, either directly or through the reactions of their stakeholders, that their artistic production is valuable—however that term is interpreted. This makes the marketing function more complex simply because messages must be crafted to influence multiple audiences simultaneously.

Volunteers

One characteristic that differentiates arts organizations from private sector firms is the presence and importance of volunteers. Volunteers may serve at all levels of the organization, from those who distribute programs at performances to members of the board. Indeed, as mentioned in the section on stakeholders, the same individual may serve both of these functions and more. The implications for arts organizations, as for many other NFPs, is that a proportion—often quite a large proportion—of those providing labor to the

organization have little formal connection and receive no monetary rewards. Given that this part of the labor force plays an important role in furthering the organization's goals, managing volunteers assumes major importance for many arts organizations.

Since volunteers lack a monetary incentive, there has been considerable interest in what motivates them to donate their time and effort (Clary, Snyder, & Stukas, 1996). Many volunteers cite altruistic values as their main reasons for donating their involvement. More recent analyses, however, have focused on the social interaction that occurs between volunteers, the organization, and others in the volunteer group. People may volunteer to act on their values, perhaps a belief in the importance of culture, to learn new skills, to develop psychologically, to gain social benefits, or to build self-esteem and confidence. While there is little research in the arts area to tease out these varied motivations it is clear that any group of volunteers may include individuals with quite diverse reasons for their activity. Keeping them engaged and productive is far from a straightforward task, especially since the volunteers themselves usually do it.

Dealing with volunteers is complicated by the dynamic nature of their relationship to the organization (Bussell & Forbes, 2007). Volunteers may join an organization to fulfill one need-for example, increased knowledge-and once that need is satisfied, they either restructure the relationship by focusing on another need or exit the organization. At the same time, life circumstances such as job commitments, age (many volunteers are either students or the retired), family obligations, or interests may shift over time. Volunteers also change as they gain information about the organization and its operations. Most arts organizations continually recruit volunteers in order to replace those who leave. This approach is inefficient, as those with little relevant experience or skill replace trained, knowledgeable personnel. Even though the personnel are unpaid, the costs of turnover are still substantial. A more dynamic model of engagement suggests that monitoring and reacting to changing motivations can prolong the attachment of volunteers and enhance the value of the relationship for both sides.

Relationships between volunteers and organizations are dynamic at another level. Volunteers may eventually become employees, especially in positions that require little technical training, such as ticket distribution or the management of volunteers themselves. Volunteers who begin simply by contributing time to an arts institution often find themselves as donors—sometimes substantial ones. The principles of relationship marketing described earlier are more and more being applied to volunteers both to strengthen the existing relationship and to convert it to something more valuable. This requires a certain balance by senior managers since too much attention paid to those with a financial attachment to the organization may demotivate those with less to offer.

The diverse nature of volunteers and their motivations means that several layers of management may be involved in dealing with them. The mechanical function of allocating tasks and coordinating performance falls to those at lower levels of management. Where volunteers serve higher level functions such as board members, senior managers will consult them on a regular basis. All volunteers, to some extent, expect access to the artists engaged by the organization. The higher the level of commitment, the more immediate and personal the degree of contact should be. Managing this interface, especially with artists who are not permanent members of the organization, can be a delicate task.

CONCLUSION: THE DEVELOPMENT OF ARTS MANAGEMENT

The discussion of various topics offered in this chapter is not comprehensive, but it does offer an overview of some of the important issues in arts management. The limited literature available makes it clear that managing the arts does differ in important aspects from activities in commercial firms and even from practices in other NFP organizations. Multiple overlapping stakeholder groups, the relationship to customers and clients, the subjectivity of aesthetic criteria, and the changing environment of the industry itself are all factors that impinge on both the structure of arts organizations and the management of activities within them. Even concepts such as relationship marketing, which have been imported from the profit-making sector, have been modified to meet their special needs. One of the more important tasks for researchers and theorists is to document in a systematic way the extent and character of these differences. Piecemeal evidence describing these arrangements continues to appear, mainly through case studies and limited surveys, but a few attempts have been made to consolidate these results into a coherent schema that would provide a solid base for further development.

One major issue that has emerged in this brief discussion is the contrast between large and small arts organizations. The bureaucratic nature of large institutions with guaranteed funding, a sizeable permanent staff, and high visibility poses quite different managerial challenges than those encountered by community-based groups with little or no paid staff, a fickle audience, and permanent deficits. The human resource function, for example, revolves around unions and contracts in one type of organization and the care and feeding of volunteers in the other. At the same time, both must attract and support artists if they are to succeed. Understanding the separate realities faced by managers in these varied organizations as well as the continuities between them, is an important task in developing the field of arts management.

Another dimension on which to compare arts institutions is across national and cultural boundaries. While there are many reports on how the policies and practices of a particular nation affect organizations, virtually no true cross-national or cross-cultural research exists. Given the variations in funding, tastes, history, and interorganizational collaboration that exist even in neighboring countries, managers will obviously react in different ways to these stimuli and constraints. This set of issues will take on increasing importance as the level of collaboration among large institutions around the world grows. The literature provides almost no investigation of how cultural differences impact on these joint efforts. It does seem ironic that the effect of societal culture on the management of the culture industry has received so little attention.

Even though the field of arts management, like all new areas of inquiry, has grown in a rather haphazard way, the ultimate aim of researchers in arts management must be the explication of a theoretical base that will guide both managers and further research. Developing such a theory will be difficult. The variety of factors that impact on managers as well as the numerous forms that arts organizations assume implies a series of complex interactions that can only be expressed in an abstract formulation. In the short term, given the limited amount of solid research available and the parochial aspect of much of it, middle range theories will be more feasible and more appropriate. In the longer term, a more general theory would facilitate research not by constraining the questions asked—an outcome quite at odds with the nature of arts management—but by summarizing available information and highlighting the many gaps that still exist.

REFERENCES AND FURTHER READINGS

- Assassi, I. (2007). The programming strategies and relationships of theatres: An analysis based on the French experience. *International Journal of Arts Management*, 9(3), 50–64.
- Bradshaw, P., Murray, V., & Wolpin, J. (1992). Do nonprofit boards make a difference? An exploration of relationships among board structure, process, and effectiveness. *Nonprofit and Voluntary Sector Quarterly*, 21, 227–249.
- Burton, C. (2003). Scoping the challenge: Entrepreneurial arts management in times of uncertainty. *The Journal of Arts Management, Law and Society, 33*(3), 165–195.
- Bussell, H., & Forbes, D. (2006). "Friends" schemes in arts marketing: Developing relationships in British provincial theatres. *International Journal of Arts Management*, 8(2), 38–49.

- Bussell, H., & Forbes, D. (2007). Volunteer management in arts organizations: A case study and managerial implications. *International Journal of Arts Management*, 9(2), 16–28.
- Clary, E. G., Snyder, M., & Stukas, A. A. (1996). Volunteers' motivations: Findings from a national survey. *Nonprofit and Voluntary Sector Quarterly*, 25(4), 485–505.
- Cray, D., Inglis, L., & Freeman, S. (2006). Strategic decision making in the arts: Topics and processes (Working Paper Series, 22/06). Melbourne, Australia: Monash University Department of Management.
- Cray, D., Inglis, L., & Freeman, S. (2007). Managing the arts: Leadership and decision making under dual rationalities. The Journal of Arts Management, Law and Society, 36(4), 295–313.
- De Voogt, A. (2006). Dual leadership as a problem-solving tool in arts organization. *International Journal of Arts Management*, 9(1), 17–22.
- Fillis, I. (2004). The entrepreneurial artist as marketer: Drawing from the smaller firm literature. *International Journal of Arts Management*, 7(1), 9–21.
- Finley, D. S., Gralen, A., & Fichtner, L. (2006). From bankruptcy to sustainability: Stakeholder engagement and strategic renewal in a performing arts organization. *International Jour*nal of Arts Management, 9(1), 4–73.
- Lee, H.-K. (2005). Rethinking arts marketing in a changing cultural policy context. *International Journal of Nonprofit and Voluntary Sector Marketing*, 10, 151–164.
- Rentschler, R. (2002). Museum and performing arts marketing: The age of discovery? *Journal of Arts Management, Law and Society*, 32(1), 7–14.
- Rentschler, R. J., Radbourne, R., Carr, R., & Rickard, J. (2002).
 Relationship marketing: Audience retention and performing arts organization viability. *International Journal of Non-profit and Voluntary Sector Marketing Management*, 7(2), 118–130.
- Ropo, A., & Sauer, E. (2007). The success of Finnish conductors: Grand narratives and small stories about global leadership. *International Journal of Arts Management*, 9(3), 4–15.
- Sicca, L. M., & Zan, L. (2005). Much ado about management: Managerial rhetoric in the transformation of Italian opera houses. *International Journal of Arts Management*, 7(3), 46–64.
- Yukl, G. (2006). *Leadership in organizations* (6th ed.). Upper Saddle River, NJ: Pearson Prentice-Hall.

HOSPITAL PLANNING FOR WEAPONS OF MASS DESTRUCTION INCIDENTS

SCOTT SOMERS AND RONALD PERRY

Arizona State University

ith the increase in worldwide terrorism incidents, hospital disaster plans need to be scrutinized to ensure they include preparedness elements that are unique to weapons of mass destruction (WMD) incidents. The practice of emergency planning varies considerably among hospital facilities. The nature of the hospital planning process reflects a facility's size, functions, and resources. Larger health care facilities have more resources and personnel and greater organizational complexity in medical specialization. Such hospitals tend to create formalized processes and rely more heavily on written plans and interagency agreements. Smaller facilities may adopt an informal process based on personal relationships and produce few written documents. Communities with a high frequency of hazard impacts—hurricanes along the Gulf Coast or earthquakes in California— are also likely to have a formalized planning process, even in smaller jurisdictions. The threat of WMD transcends these patterns because of the difficulty in predicting such events and the lack of geographic or seasonal focus. Even standard planning practices need modification to account for WMD threats. For example,

- · the hospital itself or its staff may be targets;
- patients will arrive at the hospital with little or no warning (patients also converge on facilities closest to the scene, if there is a scene);

- many patients will be self-referred without treatment by emergency medical personnel at a scene;
- patients may need to be decontaminated at the hospital;
- the hospital building, equipment, and personnel can become contaminated;
- information regarding the nature and hazard of the agent will not be immediately available to hospital staff; and
- many patients will be present as "worried well," having little or no exposure to the agent.

These and other circumstances dictate that conventional planning may not be adequate to meet the demands posed by a WMD incident.

Using examples of hospital experiences with such incidents, this chapter reports on planning lessons learned. A foundation for good planning is examined by acknowledging that planning is an ongoing process that requires linkages to the wider community including public health authorities, political authorities, and emergency responders. The importance of realistic assumptions about how people react to disasters is also discussed. This chapter reviews special elements of WMD incidents that need to be addressed in hospital disaster plans, such as, incident command, patient surge, communications, universal precautions, personal protective equipment, decontamination, and hospital security. This chapter closes with a discussion

of the importance of training and exercising in preparing hospitals to respond to WMD events.

ESTABLISHING A FOUNDATION FOR GOOD PLANNING

The foundation of good emergency planning is rooted in applicable standards and regulations, the establishment of regional planning efforts, and an understanding of how citizens respond to crisis.

Standards and Regulations Pertaining to Hospital Planning

Complying with codes, standards, and regulations is a significant aspect of managing hospital operations. The Joint Commission for Accreditation of Healthcare Organizations (JCAHO) has created standards that require hospitals to develop (Standard EC 1.4) and regularly exercise (Standard EC 2.9.1) an emergency response plan. Standards generally do not have the force of law, unless a local government body adopts them. Regardless of whether the jurisdiction having authority has adopted standards as code, standards are frequently cited in court cases. In contrast, hospitals must adhere to federal and state rules and standards, which are promulgated and enforced by a regulatory agency. Some regulations relevant to WMD preparedness are found in the Code of Federal Regulations (CFR) and include HAZWOPER (29 CFR 1910.120(q)), personal protective equipment (29 CFR 1910.132), eye and face protection (29 CFR 1910.133), and respiratory protection (29 CFR 1910.134). The Superfund Amendments and Reauthorization Act (SARA) Title I was enacted to require the Occupational Safety and Health Administration (OSHA) to enforce regulations for health and safety. OSHA 1910.120 describes the minimum level of knowledge, skills, and abilities that must be met by first responders. While not directly related to health care facilities, the National Fire Protection Association (NFPA) publishes standards for the fire service that define competencies for personnel responding to hazardous materials incidents. These documents can be useful in designing training programs for hospital preparedness. Finally, the National Institute for Occupational Safety and Health (NIOSH) works closely with the Center for Disease Control and Prevention (CDC) in developing regulations related to protecting health care workers from infectious diseases. Hospital planners must keep abreast of applicable codes, standards, and regulations to ensure that emergency plans and training programs meet minimum standards.

Establishing Regional Relationships

Hospitals are critical parts of the system that forms a community. As such, they are immersed with government, suppliers, law enforcement, emergency medical services, and the public health system—crossing the public, private,

and nonprofit sectors. Effective emergency preparedness requires that hospitals create linkages across these sectors with the goal of insuring readiness for chemical, biological, radiological, nuclear, and explosive agents. For hospitals, the specific objective is to minimize the negative health consequences of an event while preserving the integrity and resiliency of the health care system. Preparedness takes place through a system of emergency planning, acquisition of support equipment and supplies, and training personnel in their response roles. There is a tendency to think of planning as an isolated task undertaken independently by each type of organization. Historically, hospitals have individually addressed issues such as mass casualty response, disease surveillance, patient tracking, and medication and immunization availability in an effort to achieve adequate facility preparedness. WMD incidents demand fuller participation in collective planning.

Fuller participation demands adopting a regional view of the plan process, the definition of the threat, and the determination of resources. Regional planning can help address capability deficiencies by establishing prearranged agreements for sharing of resources that—while adequate for everyday needs—may be in short supply during a terrorist event. Plans also need to be in place for internal and external communication. This communication is not just for emergency response; staff needs to be able to recognize diagnostic cues and understand how to report illness patterns to the public health system to identify disease patterns potentially caused by a terrorist action.

Local government fire and law enforcement organizations have long entered into voluntary mutual aid agreements to facilitate a rapid, coordinated, and effective response to large-scale incidents. Such agreements forestall situations that may overwhelm the resources of any single jurisdiction by establishing a formal relationship among signatories that set guidelines for sharing personnel, resources, and equipment. Regional imbalances are easily created by victim self-referrals to hospitals nearest the incident site, quickly overloading some institutions while others receive few patients. Hospital mutual aid systems allow for the systematic redistribution of patients and the sharing of medical or support staff, supplies and equipment, and pharmaceuticals. Regional preparedness through mutual aid should be considered a standard of care in the health care community.

Local governments and emergency management authorities have been engaging in intensive efforts to develop communitywide terrorism response plans. After the 9-11 attack, hospitals were recognized as an integral component in local planning and response to terrorist events (General Accounting Office, 2003). Through participation in planning efforts, hospitals learn the expectations authorities have of them, while also educating officials on the capabilities and limitations of the regional health care system. Participation also creates linkages with local agencies that can support hospital operations during crises. The community planning process enhances hospital contacts with prehospital care

providers and guides treatment protocols, enhances triage practices, and shapes patient load by identifying priorities for receiving hospitals. Additionally, planning committees are the place for dialogue about the need for specialized expertise and equipment such as patient decontamination and off-site treatment locations.

Finally, the ability of hospitals to respond effectively to a WMD event depends on establishing linkages to the public health system. Public health authorities serve as both a source of funding and information to address needs such as isolation, quarantine, evacuation, medications, treatment protocols, and long-term patient care. There are thousands of local health departments involved in disease outbreak investigations, vaccination campaigns, and environmental testing. Public health authorities possess legal power to order mass evacuation and immediately commandeer appropriate space to address patient surge capacity, receive and distribute federal medical assets, and conduct mass immunization. At the national level, the CDC maintains a stockpile of pharmaceuticals and provides assistance to public health departments for WMD incidents. Dialogue among hospitals, public health agencies, and other concerned organizations is an important path for addressing the long-term rehabilitation and health care needs of victims of WMD agents. Tracking of victims of the Bhopal chemical release, for example, required years of follow-up care. Given the special treatment needs of various agents, hospitals, rather than private physicians, will have to assume a significant role in long-term patient care.

Understanding Citizen Response to Terrorism

In the wake of a disaster, press coverage commonly focuses on stories of personal psychological incapacitation or isolated examples of social deviance. Such stories have given rise to a number of common myths regarding citizen responses to disasters, despite evidence to the contrary. Misconceptions about individual and group behavior during and immediately after the impact of a disaster lead many administrators to expect widespread panic, passive obedience to authority, or inaction due to emotional shock. Social science research has repeatedly shown that maladaptive behaviors rarely materialize. Individual behavior during the disaster period tends to be prosocial as well as rational. Myths of irrational and antisocial behaviors in disaster are not inconsequential; they hamper the effectiveness of planning efforts, lead to misallocation of resources, and cause officials to withhold critical information from the public. Research on human behavior provides a basis to predict and prepare appropriately for response to the immediate postterrorist incident period.

First, hospital emergency planners should expect patients to exhibit anxiety, not panic. Technically, panic is an acute fear reaction accompanied by a loss of self-control and analytic ability, often associated with flight behavior. Yet, past terrorist incidents have demonstrated that such reactions are extremely rare. Aguirre, Wenger, and Vigo (1998) studied

the evacuation of the World Trade Center after the bombing in 1993 and found no documented incidents of panic flight. Similarly, after the terrorist attacks on September 11, 2001, thousands exited the burning towers in an orderly manner, with many examples of altruistic responses. In one instance, two men carried a wheelchair-bound woman to safety from the 68th floor of Tower 1 (Murphy & Levy, 2001). Although not common, panic flight in disaster situations is not entirely unheard of. When panic flight is observed, it appears to occur in only a small percentage of the affected population, lasts for a short period of time, and is a reaction to a number of simultaneously existing conditions. These include (a) a perception of an immediate threat of entrapment; (b) a belief in a lack of escape options, except through flight; (c) a sense of complete social isolation, that is, there is no one else that can be depended on to help in a situation; and (d) ineffective crisis management and a lack of communication. Providing direct, relevant information about the hazard and any actions people can take to protect themselves is the key to addressing anxiety. Withholding information only increases anxiety; it does not prevent panic.

While one can reasonably anticipate victim cooperation and action in the short run, the disaster syndrome can be extended, and traumatic responses are possible. Even posttraumatic stress syndrome and other difficulties can be manifest in psychological responses, particularly depression and sometimes "survivor syndrome." The research literature shows that such long-term consequences are more likely to arise among: (a) people who have witnessed death or handled the dead; (b) people who have been exposed to large-scale property destruction; (c) people whose relatives, neighbors, or friends have been seriously injured or lost their lives. Particularly in terrorist events where victims often bear no obvious relationship to perpetrators, individuals experience long-term anxiety, guilt, and depression. Even in the absence of death of significant others or direct contact with death, loss of property and other negative economic consequences associated with it can produce depression. Hospital authorities need to plan for crisis-counseling capabilities for both victims and their families, as well as for nonvictim self-referrals (psychological casualties). Also, long-term postevent plans should include provisions for therapeutic contact as a means of reducing long-term negative consequences for citizens.

A second important observation for planners is to expect people to take action for their own protection. There have been documented cases of postdisaster shock behavior characterized by docility, disorientation, and disbelief. Termed the *disaster syndrome*, this reaction that immediately follows the disaster impact period has lead to the myth that victims will engage in irrational behavior and are unable to care for themselves. Three important conclusions have emerged from research on this issue. First, the disaster syndrome appears to occur most frequently in events that have little forewarning and result in severe damage, injury, or death. Second, only a relatively small percentage of the

affected population will exhibit symptoms of disaster syndrome. Third, symptoms of disaster syndrome typically last only a few hours and do not extend beyond the immediate postimpact period. In general, researchers have found that people will take action to protect themselves during and following a disaster. Studies of individual actions following California earthquakes have documented the self-protective actions residents take as recommended by authorities (Bourque, Russell, & Goltz, 1993). It is therefore important that information provided by authorities include appropriate actions people can take to protect themselves. In the absence of such information, people will take action anyway—devising creative solutions that may turn out to be harmful. A well-developed public information strategy can enable positive adaptive behaviors and reduce anxiety.

Finally, it is appropriate for planners to expect victim compliance with direction and guidance. When dealing with unfamiliar situations or while under extreme stress, citizens often look to public authorities and experts—such as physicians, nurses, and emergency medical personnel-for protection and guidance. In the height of a crisis, citizens can be expected to carefully follow the direction of hospital staff. In March 1999, a collection agency received an envelope reportedly containing anthrax. While news helicopters hovered above, 10 women stood nude in an open-top corridor to be decontaminated by an all-male hazardous materials team. While one person brought up the issue of modesty, none of the women refused to comply with the instruction of emergency responders (Perry & Lindell, 2003). This incident illustrates the level of trust people have in authorities in times of crisis and the degree to which they will comply with instruction. It is important for hospital planners to remember that the demands created by terrorist incidents are dynamic, requiring an emphasis on response flexibility. Planning should focus on principles, not an elaborate process. Citizens will comply with the direction of authorities but they expect consideration, discretion, and competence, and they will hold authorities responsible through the political and legal process.

IMPORTANT PLANNING CONSIDERATIONS

A terrorist attack is likely to involve a multiagency response and could involve mass casualties. Hospitals will need to coordinate planning efforts to maximize treatment capacity and capability. At a minimum, hospital planning for WMD events must promote effective communication and information sharing, coordination with other agencies, and distribution of resources.

Interoperable Communications and **Information Management**

External communications capabilities and effective information management are staples of a coordinated response to disasters, especially WMD incidents. Regional planning efforts should focus on establishing reliable, multimodal communication links with prehospital providers, assisting medical facilities, public health officials, and other relevant organizations. Hospital communications and data systems must also link with local and regional emergency operations centers. Individual modes of communication have all experienced problems in disasters, including overloaded cell phone systems, a lack of mobility and scalability of intercom systems, poor interoperability of radio communications and lack of availability of frequencies, and insufficient access to laptop computers with Internet connection for data exchange (Kenar & Karayilanoglu, 2004). Well-prepared regions employ a combination of systems with which to share data including e-mail, the Internet, radio, telephone, and fax machines. Such systems may be developed through regional planning efforts or purchased through commercially available systems.

Interoperability refers to the ability of emergency responders to communicate and work seamlessly via a myriad of voice and data systems. "Communications problems and the inability to coordinate with other disciplines and jurisdictions have been recognized as major operational limitations in every major incident, from the shootings at Columbine High School to the terrorist attack on the World Trade Center" (Pessemier, 2006, p. 2). Implementation of a unified command structure at the WTC was hampered due to a lack of interoperable communications between the FDNY, the New York Police Department, and the Port Authority of New York (National Commission on Terrorist Attacks, 2004). In 2004, 50% of local jurisdictions had no interoperable communications between their police, fire, emergency medical services, and public works departments, while 88% of cities were not interoperable with the U.S. Department of Homeland Security (U.S. Conference of Mayors, 2004). Yet, the "ability of an agency to execute its essential functions . . . is dependent upon the identification, availability, and redundancy of critical communications and information technology systems to support key government leadership, internal elements, other agencies, critical customers, and the public" (Federal Emergency Management Agency, 2004, p. 6). Preparedness plans must identify communications systems that directly support an agency's essential functions, provide protection from disruption to primary channels of communication, and ensure sufficient redundant backup systems are in place.

Voice communications are one component of a comprehensive data communications system. Attention must also be paid to designing and using secure, standards-based Internet protocol architecture to ensure interoperability with data transferring information technology systems. Hospitals need to share data on the nature of the hazard and patient conditions, as well as the availability of beds, specially trained personnel, pharmaceuticals, and medical supplies. Many areas have established regional clearinghouses that fill a critical role as information management systems and serve as a point of contact for health care facilities for collecting and disseminating real-time information. An appli-

cation of the regional clearinghouse concept is the St. Louis Area Regional Response System (STARRS). STARRS structures coordinated planning and response for large-scale critical incidents in the St. Louis metropolitan area. Components of the system include a Hospital Emergency Administrative Radio (HEAR) network (a VHF radio system), EMSystem (an Internet-based hospital status system), the Emergency Patient Tracking System, and routine communications (phone and fax). The concept and practice of STARRS are clearly important models for export to other areas

Detection of a terrorist attack, especially one involving biological agents, is likely to be uncovered as unusual illness patterns appear in local hospitals. The CDC has developed two Internet-based communication tools for information exchange among public health entities (Masci & Bass, 2005). The Health Alert Network (HAN) was launched in 1999 in partnership with the National Association of County and City Health Officials, the Association of State and Territorial Health Officials, and others. HAN links a myriad of health service organizations critical to national health care preparedness and response through a high-speed, continuous, secure Internet connection. The system allows for distance learning through satellite- and Web-based technologies; provides an early warning system for broadcast of urgent health threats; allows local health authorities access to shared disease reports, response plans, and diagnostic and treatment guidelines; and allows for rapid communication and coordination of local, state, and federal health authorities during an incident (CDC, 2007b). Similarly, the Epidemic Information Exchange (EPI-X) is a secure communications network for public health authorities designed for surveillance and notification of urgent health care events. Since the network's inception in 2000, approximately 6,700 reports have been posted to the site related to SARS, West Nile virus, influenza pandemic preparation, food-borne outbreaks, and natural disaster health-related issues (CDC, 2007a).

Clearly, the connection between hospitals and other critical disaster response organizations has yet to be optimized. The important principle here is to be aware that terrorist events require a highly coordinated response. The demands imposed by WMD incidents are immense and affect virtually all community institutions. No hospital can effectively operate independently during such an event; demands created by the complexities of the incident quickly outstrip capacity and capabilities.

Adopting a System for Managing the Incident

Management of emergency operations during a WMD incident demands a nontraditional linking of agencies. Following the terrorist attacks in New York City in 2001, the World Trade Center became not only a mass casualty incident but it was also a large fire, a crime scene, a public health hazard, and a national security event. Incidents involving WMD agents create confusion and chaos in the

hospital setting that lacks an efficient and effective system for managing operations and coordinating the efforts of the various response agencies. A study of hospital management after an earthquake in Gujarat, India found that hospitals that utilized an Incident Command System (ICS) were better able to sustain medical service delivery both during and after the crisis (Bremer, 2003). JCAHO requires facilities that it accredits to adopt a command structure in coordination with local responders.

Hospitals differ from other critical community response entities in that they are autonomous facilities that lack a defined command structure or paramilitary-style hierarchy. Organizing and coordinating interfacility operations can be difficult using the traditional command model since these facilities may lack personnel with the organizational roles, functional responsibilities, or legal authority necessary for seamless integration into the ICS. Many health care facilities therefore are adopting a version of ICS that is tailored specifically to medical operations. The Medical and Health Incident Management System (MaHIM) is one such variation of the ICS and is intended to facilitate regional coordination of health care facilities. MaHIM was designed to be used as a toolkit providing broad-based management strategies and actionable items that can be used during a crisis. In addition to being an incident management system, MaHIM addresses specific operations problems presented by mass casualty incidents such as casualty distribution, patient tracking, and coordination and information sharing among facilities.

Perhaps the most common ICS system designed specifically for internal hospital use is the Hospital Emergency Incident Command System (HEICS). HIECS was built upon the principles of ICS and designed as an operational framework for hospital response to a variety of hazards. HEICS includes a core set of response concepts, procedures, and terminology that enables medical staff to fully integrate their activities with those of supporting agencies, such as the fire department, hazardous materials teams, and emergency medical services, as well as better manage the influx of self-referred patients, family members, and others who converge on medical facilities after an incident (Macintyre et al., 2000). The U.S. Occupational Safety and Health Administration (2004) considers HEICS a best practice for emergency preparedness. Fundamental elements of the system include a predictable chain of command with a flexible organizational structure, accountability of position and team function, and common terminology for promoting interagency communication.

Version IV of HEICS was published in August 2006 with support from the American Hospital Association, the U.S. Department of Homeland Security (DHS), and JCAHO. HEICS has evolved into the Hospital Incident Command System (HICS) and can play a major role in advancing institutional preparedness while integrating health care facilities into the local response system. This latest version is also consistent with many of the components of the National Incident Management System, mandated by

DHS to promote national standardization in command and management structures, as well as place an emphasis on preparedness, mutual aid agreements, and resources management. HICS incorporates new operational tools to support hospital planning activities for a multitude of realistic events including epidemic, natural disasters, civil unrest, and acts of terrorism.

HICS includes the Job Action Sheet (JAS), a customizable incident management tool that is designed to familiarize users with critical aspects of their command position. Each of the 78 JAS forms include information regarding the name of the command position, graphic depictions of reporting relationships, a brief statement summarizing the mission and basic purpose of each job, and documents and tools to facilitate the completion of roles and responsibilities. The JAS forms provide a prescribed format and standardized terminology that ensure compliance with the National Incident Command System utilized by federal, state, and local responders.

Homeland Security Presidential Directive 5 (HSPD-5) created the National Incident Management System (NIMS). NIMS is intended to be an all-hazards system for coordinating public, private, and nonprofit assets during incidents of national significance. It is based on the established management characteristics of ICS, but also stresses multiagency coordination, public information systems, and elements generally associated with mitigation. HSPD-5 requires hospitals to comply with NIMS by August 2008 as a condition of receiving federal grants or contracts. The NIMS Integration Center in cooperation with the U.S. Department of Health and Human Services developed detailed guidance in the NIMS Implementation Activities for Hospitals and Health Care Systems to assist hospitals with implementation of NIMS.

Dealing With Patient Surge

A hospital's capacity to manage a large influx of patients following any disaster is a critical element of preparedness planning. Surge capacity is the ability to mobilize, for a time-limited period, the availability of space and resources to provide medical care in response to sudden or prolonged demand (JCAHO, 2003). Planning for the sudden increase in demand for medical services also involves surge capability, the ability of the health care system to acquire specialized resources to manage patients with special needs, such as decontamination, treatment of burn injuries, or medical quarantine (Hick et al., 2004). Past natural and technological disasters have illustrated the need for surge capacity and capability. The worst chemical disaster on record occurred in Bhopal, India resulting in 150,000 casualties that needed treatment for exposure (Srivatsa, 1987). The sarin nerve gas attack on the Tokyo subway in 1995 produced 6,000 injured, many of whom bypassed emergency medical services and self-referred to local hospitals (Perry & Lindell, 2003).

Addressing an acute surge in health care needs is complicated by a trend toward decreasing inpatient care capacity and the nationwide shortage of skilled medical professionals. The expansion of managed care coupled with increasingly stringent Medicare and Medicaid reimbursement policies, has resulted in the closure or consolidation of hospitals. In 2002, there were 900 fewer hospitals than there were in 1980 (JCAHO). This has resulted in the loss of 38,000 hospital beds, including a 20% decline in ICU capacity (Hick et al., 2004). Furthermore, high numbers of uninsured people and a lack of availability of primary health care physicians have forced many to seek treatment of minor medical ailments in already overcrowded emergency departments. Biological and chemical agents also require more intensive treatment and observation of patients, which necessitates still more capacity and trained medical personnel. A severe nursing shortage, estimated to be 400,000 by 2020 (Buerhaus, 2000), jeopardizes the availability of critical, specialized medical treatment after a WMD event.

Unfortunately, no single framework exists to adequately prepare health care facilities for the inevitable patient surge that would accompany a nuclear, biological, or chemical attack. Hospital administrators must work with local disaster planning groups to develop surge plans based on the community's Hazard Vulnerability Assessment and on the capabilities of the regional health care system. Fundamental components of such plans include the immediate deployment of additional health care personnel, patient decontamination, isolation capacity, medical surveillance, compatibility of equipment throughout the regional health care institution, adequate short-term pharmaceutical reserves, staff training and personal protective equipment, and interoperable communication and information-sharing technologies. Planning for surge capacity and capability requires a systems-based approach that builds from the individual hospital facility plan to integration into a local health care coalition, ultimately with the support of state and federal medical assets.

Establishing Facility Surge Capacity

JCAHO defines surge in place as the ability to expand capacity in an existing health care facility in order to meet the increased demand on a facility. This requires explicit planning in order to quickly expand patient capacity through restructuring of existing bed space and incorporating alternative on-site treatment areas. Strategies for increasing hospital bed availability include canceling elective procedures, adding more stringent triage and admission standards, and discharging inpatients early and providing follow-up home health care by professionals. Within 3 hours of the 2001 attack on the Pentagon, Inova Health System's four hospitals in northern Virginia freed up 343 beds (nearly 25% of their capacity) and 43 operating rooms for immediate use (Hick et al., 2004). Another example of surge in place involves expanding operations into a closed ward of an existing facility; the Earl K. Long Medical Center in Baton Rouge effectively doubled its 200-bed capacity to treat victims of Hurricane Katrina by opening several closed wards within the hospital (JCAHO, 2006). Other accommodations can be made by incorporating "hasty treatment space" such as hallways, sheltered parking, meeting rooms, and office space. Under some circumstances where risk of contagion is low or patients are asymptomatic, quarantine of patients at home may be an option for increasing capacity.

Of course, expanding capacity requires adequate staffing with qualified personnel. The surge component of the hospital emergency operations plan should examine measures to effectively utilize hospital personnel for disaster duty, such as expanding work shift hours, calling back off-duty employees, adapting nonclinical staff to include clinical roles where appropriate, and developing rosters of private physicians with hospital privileges to call in during an emergency. On March 20, 1995, the St. Luke's Hospital Emergency Department in Tokyo, Japan received 640 patients within two hours of the sarin gas attack on the city subway system. Buck (2002) found that 541 of those patients were self-referred having never been treated by emergency medical services workers at the scene. The hospital had previously conducted extensive disaster planning that included a contingency plan to address the needs of patient surge capacity and capability. St. Luke's plan was implemented postponing routine surgical and outpatient procedures. This freed up over 100 physicians and 300 registered nurses and volunteers to handle the influx of patients from the terrorist attack.

Establishing Regional Surge Capacity

Planning for surge capacity and capability must extend beyond individual medical facilities to include an interorganizational, multijurisdictional, and multidisciplinary work plan to adequately meet the health care needs and provide a safe environment for WMD victims. This process begins with taking an inventory of community assets and other resources, including alternate sites that can be quickly converted to treatment space. It is important to calculate expansion capacity based on accepted patient standards of care. Target surge capabilities established by the National Preparedness Goal call for 500 beds per 1 million patients with acute symptoms of exposure to infectious disease and 50 beds for patients with noninfectious diseases and injury. Effective joint preplanning can help identify alternative sites for adding capacity. JCAHO (2006) guidelines on surge hospitals identify some nonmedical buildings that can be used as "facilities of opportunity" such as warehouses, veterinary hospitals, convention centers, airport hangars, sports arenas, and hotels. Mobile medical facilities and portable "hospitals in a box" trailers are "fully equipped, self-contained, turnkey systems designed to be set up near mass casualty events to treat the most severely wounded as soon as possible" (p. 3). When traditional medical facilities become overloaded, nontraditional sites, often referred to as casualty collection points (CCP) or patient staging areas (PSA), may be designated to collect, triage, and begin initial

prehospital treatment of victims (Buck, 2002). CCP and PSA sites aid in the control of patient flow to emergency departments and can be used to cohort patients with similar symptoms to the same medical facility as well as triage patients to facilities with appropriate specializations such as trauma centers, burn centers, or poison control hospitals.

The Center for Disease Control maintains a national repository of pharmaceuticals and medical materiel that includes antidotes, antitoxins, IV equipment, airway maintenance supplies, and medical and surgical items. The Strategic National Stockpile (SNS) program works with governmental and nongovernmental agencies to rapidly supplement local public health capabilities by delivering caches of medications and supplies to affected areas with 12-hour Push Packages that can be delivered anywhere in the United States within 12 hours of an event. As an incident progresses, Vender Managed Inventory packages begin to arrive within 24 to 36 hours brining in agentspecific medications and supplies. Once materiel has arrived at the designated receiving site, responsibility for logistical support for the collection, security, and distribution of the Strategic National Stockpile is the responsibility of state and local authorities. Plans for providing adequate staging space, trained personnel, and transportation of materiel must be prepared and exercised in advance of an incident to ensure prompt and effective use of SNS assets.

Surge capacity planning must also take into consideration the fact that WMD events involving NBC agents have the potential to create a high mortality rate. Deceased victims may continue to pose a significant public health threat due to an infectious disease or contamination hazard (Morgan, 2004). This requires that planners work with public health authorities and medical examiners to address the need to expand morgue facilities or establish temporary morgue space. Additional capacity will be needed to facilitate postmortem examinations, victim identification, and disposition of remains. Such procedures are needed to confirm the pathogen involved and inform treatments. Disaster mortuary response teams (DMORT) may be used to augment local medical examiners or establish field mortuary operations. The Federal Emergency Management Agency maintains two disaster portable morgue units in support of DMORT operations—one located in San Jose, California and a second in Rockville, Maryland. These units contain a fully equipped and stocked morgue and are capable of supporting autopsies with x-ray equipment, forensic dental pathology examinations, forensic anthropology studies, and finger print processing.

PROTECTING STAFF, PATIENTS, AND VISITORS

Emergency management plans must include procedures for preventing the spread of infectious disease, chemical residue, or radiological exposure to medical personnel, patients, and the community at large. Protective actions include universal precautions, decontamination, personal protective equipment, and hospital security.

Universal Precautions

The anthrax outbreak that occurred in the United States in the latter part of 2001 raised the specter of bioterrorism. Dissemination of the disease was through letters containing anthrax spores sent through the postal system resulting in 5 deaths and sickening as many as 22 others. Health care workers are particularly vulnerable to contagious diseases given that those infected will seek treatment in the emergency department and clinics. An illustration of this susceptibility is the SARS outbreak in China and Canada in 2003 where primary care physicians, nurses, and other health care professionals were among those who became ill along with civilian patients. To help prevent the spread of disease, hospitals need to establish policy that ensures that employees understand and follow appropriate infection control practices at all times.

Universal precautions and the higher level of protection, body substance isolation, are designed to protect health care workers from infectious diseases. Standard universal precautions generally involve the use of barrier devices such as disposable gloves, masks, goggles, and disposable garments. Increased levels of respiratory protection, such as the N95 mask, may require fit testing to ensure proper sizing, otherwise adequate protection may be lacking. Contract employees and janitorial services should also utilize disposable garments and follow proper contamination avoidance procedures to reduce exposure. Other elements of an effective infection control program include immunizations, patient isolation policies, decontamination procedures, proper waste handling and disposal practices, and continuous training. Hospitals must learn all they can about the risks brought on by a biological terrorism threat. This means working closely with prehospital providers, epidemiologists, public health officials, and emergency managers to develop standards and guidelines for the treatment and control of infectious disease outbreaks.

Decontamination

Decontamination is the process of removing potentially harmful or dangerous substances from people, equipment, or supplies in order to prevent the spread of contaminants beyond the already contaminated area and to avoid adverse health effects to unexposed persons and health care providers. It is extremely important that victims of WMD incidents, particularly those involving radiological or chemical materials, be decontaminated prior to treatment. Generally, hazardous materials responders will conduct decontamination procedures on scene before transporting patients to the emergency department. However, in some instances it may be necessary for EMS to quickly treat victims with life-threatening injuries while simultaneously conduct-

ing emergency decontamination procedures. "Gross" or "emergency" decontamination efforts are used to remove large quantities of contaminants from a surface. While this process significantly reduces the hazard of cross contamination, a more thorough decontamination of a victim may have to be done at the hospital. Furthermore, self-referred patients may carry residue of dangerous substances and need to be isolated and decontaminated before being seen in the emergency department.

Consequently, it is necessary for hospitals to establish procedures, train personnel, and acquire the equipment necessary to decontaminate patients. Both JCAHO and OSHA mandate that hospitals develop and maintain emergency response plans for dealing with hazardous materials incidents. These standards require that emergency departments maintain current toxicological reference materials and antidote information, a list of referral and consulting contacts, and equipment for handling hazardous materials. OSHA requirements under 29 CFR 1910.120[q] identify the need for training staff in the duties in which they are expected to perform.

Establishing decontamination capability requires the availability of special solutions, showers or spray nozzles with water containment, monitoring instruments, facilities to provide modesty, bags for the collection of personal items, and accommodations for both ambulatory and nonambulatory patients. The specific measures required for decontamination will depend on the physical state of the agent involved, the water solubility or vapor pressure of the substance, and the level of contamination. Under IMS, the decontamination officer is responsible for determining the most appropriate decontamination procedure and managing the decontamination process. Assessing decontamination needs will require that medical staff contact field personnel for information about the degree and type of exposure encountered. A local poison control center may also be consulted about potential treatment protocols. Hospitals can contact the Chemical Manufacturers Association for information on exposure and treatments of specific chemicals. The National Response Center operates the Domestic Preparedness Chem/Bio Hotline for technical advice for dealing with WMD agents.

Personal Protective Equipment

Medical practitioners and hospital staff must be adequately protected from potential exposure to hazardous materials. Personal protective equipment (PPE) and garments are designed to shield individuals from the harmful effects of chemical, biological, and radiological residue as well as the physical hazards that might be encountered during a WMD event. The Department of Justice publication *Guide for the Selection of Personal Protective Equipment for First Responders* provides information to aid in the selection and purchase of respiratory and percutaneous PPE. While not held to the same standards as emergency services personnel, OSHA standards state that the hospital

staff's PPE be "sufficient for the type and exposure levels an employee can reasonably anticipate from such incidents" (Fairfax, 2002). An important consideration for planning is the selection of PPE based on the hospital's role in response to WMD events and equipping employees for the worst-case scenario—exposure to NBC agents.

Providing for Hospital Security

Security not only directly protects the hospital facility, personnel, and patients, but also serves to define and separate functions, and forms an intelligence link with local law enforcement. Since few hospitals require a large security force, considerable planning is required with local law enforcement agencies to function during WMD incidents. In cities with metropolitan medical response systems, local police assist hospitals with crowd control and all security needs for off-site operations. Numerous law enforcement agencies may need to be represented in security planning, which needs to be done on a regional basis. Hospital security must be extended to all external activities (outside triage or decontamination) as well as to the institution itself. Coordination with local law enforcement is important both for ensuring adequate personnel levels, but also because the hospital becomes a link in the "chain of evidence" associated with the incident. This includes movement of patients between hospitals and movement of bodies to the county medical examiner's office and morgue and any satellite or temporary morgue facilities.

THE IMPORTANCE OF TRAINING AND EXERCISING

Once a plan is established, its implementation revolves around the logistics and protocol required to execute the specified series of tasks. Implementation usually begins with a detailed assessment of the hospital's capacity, defined in terms of its mutual aid support from the full range of regional organizations and governments. Agencies that provide different functions under the plan must be evaluated for their ability to comply. Personnel compliments and equipment need to be brought to plan specifications. In connection with or as a product of this assessment, a variety of training needs may be identified. These include both training and education of personnel regarding the threat, the response processes and procedures, as well as the use of the equipment called for under the plan. In this context, training is the activity that translates information defined as needed by the plan into a coherent program that can be imparted to responders.

Broadly speaking, *exercises* represent constructed opportunities to test the protocols and equipment specified under a plan and taught in the training phase. Exercises may be seen as a form of training in the sense that individuals are rehearsing response measures. Ultimately, however,

exercises provide the forum to test the effectiveness of both the training program and the plan, as well as the ability of personnel to execute the plan. The creation of meaningful disaster exercises demands that the event test personnel, protocol, and equipment. Thus, developing an exercise requires the elaboration of milestones designed to simulate an event or incident that approximates the threat addressed in the planning and training phases. A critical initial exercise milestone is to set the objectives for the exercise. These may be broad or narrow, depending on the scope of testing that is desired. For example, in exercising a biological response plan for a smallpox agent, one might choose to devise an exercise built solely around testing the warning phase activity. Such an exercise scenario might involve tasks associated with evaluation of medical surveillance data by public health and hospital emergency department physicians, making a decision to evacuate or quarantine private homes and businesses, constructing a warning message, and notifying and mobilizing the agencies involved in disseminating the message to the public. Once testing or exercise objectives have been set, one must devise an event scenario. Such a scenario must posit an event or series of events that offer an opportunity for plan specifications to be implemented. In some exercises, the creation of the scenario is particularly intricate involving not only simulation of an event, but also including simulated victims and physical damage. The management of an exercise is somewhat similar to a major stage production in that there must be realistic actors and props and detailed stage direction (training). Often the utility of the exercise depends in part upon the extent that participants find the activity believable or compatible with their knowledge of potential events. Exercises are usually generated with specific goals and objectives that are carefully related to the vulnerability profile and planning activity of a given jurisdiction.

It is important to emphasize that no disaster management for any threat plan should be considered final. The planning process emphasizes that plans change as the threat environment changes, as changes occur in the state of technology relative to hazard agents, and as a function of experience with the response system (Perry & Lindell, 2007). The experience dimension is among the most important. Experience comes from exercises and from incidents. In every case, an exercise critique or after-action report becomes a document to guide change in the plan. In an even more critical sense, disaster responses are tests of the plan, and the operational system and like exercises should be followed by an after-action report. While exercises simulate response operations, when the system responds to a disaster incident, one sees the critical tasks and relationships tested in the stressful conditions under which the system was designed to perform. Thus, after-action reports associated with a disaster response become not only bases for adjusting and improving the local jurisdictional emergency system, but also valuable information that can be shared with other jurisdictions to communicate lessons learned.

CONCLUSION

Preparedness leads to successful management and it flows from effective planning, training, and exercising. This chapter has assumed that the broader emergency functions such as vulnerability analysis, technical analysis of structural and nonstructural mitigation options, and organizational and technical feasibility reviews have been completed. Furthermore, we assume that a specific threat agent has been identified and a constellation of response measures have been taken. In this context, hospital emergency planning involves the construction and codification of strategy and tactics into an executable series of actions or tasks. Plans address all aspects of the response, including personnel, equipment, contingency issues, policy issues, and interorganizational and intergovernmental relations. The plan represents, then, a blueprint for addressing all aspects of multiple WMD threats. Of course, this blueprint is created within the limitations of knowledge and technology regarding the threat agents and remains subject to situational contingencies.

REFERENCES AND FURTHER READINGS

- Aguirre, B. E., Wenger, D., & Vigo, G. (1998). A test of emergency norm theory of collective behavior. *Sociological Forum*, *13*(2), 301–320.
- Bourque, L., Russell, L., & Goltz, J. (1993). Human behavior during and immediately after the earthquake (pp. B3–B22). In
 P. Bolton (Ed.), *The Loma Prieta, California earthquake of October 17*, 1989—Public response (U.S. Geological Survey Professional Paper 1553-B). Washington, DC: USGPO.
- Bremer, R. (2003). Policy developments in disaster preparedness and management. *Prehospital and Disaster Medicine*, 18(4), 370–382.
- Buck, G. (2002). Preparing for biological terrorism: An emergency services planning guide. Albany, NY: Delmar.
- Buerhaus, P, Staiger, D., & Auerbach, D. (2000). Implications of an aging registered nurse workforce. *Journal of the American Medical Association*, 283(2), 2948–2954.
- Centers for Disease Control and Prevention (2007a). Epi-X: The epidemic information exchange. Retrieved September 2, 2007, from http://www.cdc.gov/epix
- Centers for Disease Control and Prevention. (2007b). *Health alert network*. Retrieved September 2, 2007, from http://www.bt.cdc.gov/documentsapp/HAN/han.asp
- Fairfax, R. E. (2002, December 2). Training and PPE requirements for hospital staff that decontaminate victims/patients. U.S. Dept. of Labor's Occupational Safety & Health Administration. Retrieved September 2, 2007, from http://198.17.175. 68/pls/oshaweb/ owadisp.show_document?p_table=INTERPRETATIONS&p_ id=24523

- Federal Emergency Management Agency. (2004). Federal preparedness circular 65. Washington, DC: Department of Homeland Security.
- General Accounting Office. (2003). *Hospital preparedness: Most urban hospitals have emergency plans but lack capacities for bioterrorism response*. Washington, DC: Author.
- Hick, J., Hanfling, D., Burnstein, J., DeAtley, C., Barbisch, D., Bogdan, G., et al. (2004). Health care facility and community strategies for patient care surge capacity. *Annals of Emergency Medicine*, 44(3), 253–261.
- Joint Commission on Accreditation of Healthcare Organizations. (2003). Health care at the crossroads: Strategies for creating and sustaining community-wide emergency preparedness systems. Washington, DC: Author.
- Joint Commission on Accreditation of Healthcare Organizations. (2006). Surge hospitals: Providing safe care in emergencies. Washington, DC: Author.
- Kenar, L., & Karayilanoglu, T. (2004) Prehospital management and medical intervention after a chemical attack. *Emergency Medical Journal*, 21, 84–88.
- Macintyre, A. G., Christopher, G. W., Eitzen, E., Gum, R., Weir, S., DeAtley, C., et al. (2000). Weapons of mass destruction events with contaminated casualties: Effective planning for health care facilities. *Journal of the American Medical Association*, 283(1), 242–249.
- Masci, J. R., & Bass, E. (2005). *Bioterrorism: A guide for hospital preparedness*. New York: CRC Press.
- Morgan, O. (2004). Infectious disease risks from dead bodies following natural disasters. *Pan-American Journal of Public Health*, 15(5), 307–312.
- Murphy D., & Levy, C. (2001, September 21). The evacuation that kept a horrible toll from climbing higher. New York: *The New York Times*, p. B10.
- National Commission on Terrorist Attacks. (2004). The 9/11 Commission report: Final report of the National Commission On Terrorist Attacks upon the United States. New York: W.W. Norton & Company.
- Perry, R. W. (2003). Incident management systems in disaster management. *Disaster Prevention and Management*, 12(5), 405–412.
- Perry, R. W., & Lindell, M. (2003). Understanding human behavior in disasters with implications for terrorism. *Journal of Contingencies and Crisis Management*, 11(2), 49–61.
- Perry, R. W., & Lindell, M. (2007). *Emergency planning: Strategy and techniques*. New York: John Wiley and Sons.
- Pessemier, W. (2006). A fire service guide to interoperable communications. Fairfax, VA: The International Association of Fire Chiefs.
- Srivatsa, L. P. (1987). The Bhopal tragedy. *Journal of Toxicological Clinical Exposure*, 7(1), 47–49.
- U.S. Conference of Mayors. (2004). *Interoperability survey: A* 192 city study. Washington, DC: United States Conference of Mayors.

Unique Aspects of Managing Sport Organizations

Russell Hoye, Matthew Nicholson, and Aaron Smith La Trobe University, Melbourne, Australia

anaging sport organizations at the start of the 21st century involves the application of management theories, principles, and strategies that are no different to managing organizations in the corporate, government, or nonprofit sectors. The sport industry, however, does have several unique attributes that influence how these theories, principles, and strategies are applied by sport managers. Sport has become a significant industry that employs large numbers of people in a variety of roles, is used as a vehicle for economic development in tourism and major events by governments, and is a major part of modern culture as evidenced by the amount of media coverage attributed to professional sport and by the numbers of people engaged around the world in playing and watching sport. Managing sport in the 21st century requires talented managers who are cognizant of how to apply management principles in the unique operating environment of the sport industry. This chapter highlights nine attributes of sport that can be considered unique or different to managing in other organizational and environmental contexts, namely, consumer behavior, the relationship between sport and government, regulatory regimes, strategy, organizational structure, human resource management, organizational culture, governance, and performance management. Each of these unique attributes is briefly explained together with a focus on their implications for managing sport.

The management of sport organizations has undergone a relatively rapid period of professionalization over the last 30 years and sport has become a significant industry in its own right. The general expansion of the global sports industry and commercialization of sport events and competitions such as the Olympic Games, combined with the introduction of paid staff into what were previously voluntary organizations and with the growing number of people who now earn a living managing sport organizations or playing sport, has forced sport organizations and their managers to become more professional. This is reflected in the increased number of university sport management courses, the requirement to have business skills as well as industry specific knowledge or experience to be successful in sport management, the growth of professional and academic associations devoted to sport management, and the variety of professionals and specialists that sport managers must deal with in the course of their careers. Sport managers work alongside accountants, lawyers, taxation specialists, government policy advisors, project management personnel, architects, market researchers, and media specialists, not to mention sports agents, sports scientists, event managers, coaches, officials, and volunteers.

Sport employs many millions of people around the globe, is played or watched by the majority of the world's population and, at the elite level, has moved from being an amateur pastime to a significant industry. The growth and professionalization of sport, particularly in the last 30 years, has lead to changes in the way sport is consumed, produced, and managed within sport organizations at all levels of sport. The enhanced integration of the world's economies has enabled communication to occur between producers and consumers at greater speed and variety, and sport has been one sector to reap the benefits. Consumers of elite sport events and competitions such as the Olympic Games; World Cups for rugby, cricket, and football; English Premier League Football; the National Football League (NFL); National Basketball Association (NBA); and Grand Slam tournaments for tennis and golf enjoy unprecedented media coverage. Sport consumers can attend sport events live in stadiums and arenas. They can view these events through free to air and pay or cable television; can listen to events on the radio and the Internet; can read about game analyses and their favorite athletes, players, and teams through newspapers and magazines; can receive progress scores, commentary, or vision on their cell phones; and can sign up for special deals and information through online subscriptions using their e-mail addresses. The global sport marketplace has become very crowded, and sport managers seeking to carve out a niche for their event, league, or product need to understand the global sport environment.

Sport managers operating within community level sport organizations such as local clubs and associations must be able to provide safe and enjoyable sport participation opportunities. To do this, they manage risks for participants; they design, build, and manage sport facilities; they provide hospitality and support services for players, spectators, volunteers, and officials; they plan, implement, and manage events and competitions; they manage human resources that include volunteers and paid staff; they negotiate with commercial sponsors and government funding agencies for financial support for their organizations; and they identify, train, and educate athletes, coaches, and officials to sustain sporting activities. They also apply management principles in developing and sustaining positive organizational cultures within sport organizations, in regulating the actions of members and organizations involved in sporting endeavors, and in governing their organizations, which have no owners as is the case in the corporate sector. Managing sport at the community or professional levels therefore requires an understanding of several unique attributes of the sport management environment. The following sections of this chapter review nine such attributes. While these should be

considered the most significant attributes, they are by no means the only unique attributes of managing sport organizations in the 21st century.

SPORT CONSUMER BEHAVIOR

Sport can stimulate an emotional intensity in its consumers that commercial products are rarely able to stimulate. Sport fans can develop powerful emotional attachments to players, teams, and the sport itself. We know that some followers are so passionate that their interests border on obsession. This addiction provides the emotional glue that binds fans to teams, and maintains loyalty even in the face of on-field failure. We also know, however, that other supporters have a more casual relationship with sport leagues and teams and that their attendance at games can change in response to the likelihood of a close contest, previous wins and losses, the state of the venue, and even the weather.

Fans can be incredibly loyal, but they can also be fickle and critical. Some might use athletes and teams to build their self-esteem, but others may use them simply to fill their spare time. For those fans that build a sense of self through the sport, team, and/or fan groupings, the intense psychological attachment that they develop is called identification. This is because they identify themselves with that sport or group. Fans that associate their identities with a successful player or team may even vicariously share the warm afterglow of success. They experience feelings of collective identity and seasonal ritual by watching, reading, and talking about sport. In fact, contemporary sport has even been described as the modern alternative to tribal hunting practices because of customs such as match rituals, traditional ceremonies, on-field heroics, intertribe rivalries, primitive social practices, and tribal singing. Being a sports fan, in other words, can create the experience of belonging to a tribe.

The feeling of belonging and the benefits of identifying with a sport team are only two reasons why a sport fan may attend games or buy sport-related products and services. There are a series of complex and interwoven motivations that drive sport fans to spend money on a variety of different sport experiences such as attending live games, watching television broadcasts, listening to radio commentary, reading the sports pages of the daily newspapers, logging into a sport Web site or discussion forum, or buying sportbranded merchandise. These motivations include stress release, escapism, entertainment, enjoying the aesthetic beauty of sport performances, spending time with family and friends, feeling a sense vicarious achievement, potential economic gain (gambling), and building self-esteem. These motivations help to explain why people become engaged with sport, but they do not determine how strongly a person will become involved with a sport product. In other words, they do not differentiate between the fans that identify their sense of self with a team and the fans that just want to enjoy some leisure time at a good game.

Three important factors explain how people develop a strong emotional attachment to sport: attraction, selfexpression, and lifestyle. First, an individual may become attracted to a sport product, and experience high levels of enjoyment from its consumption. Second, the sport may be particularly meaningful to an individual and their sense of identity, and as a result, bolster their perception of themselves and their place in the world. The more a person feels that a sport brand confers upon them a sense of who they are, the more loyal and committed they will be to it. This can subsequently lead to a sense of camaraderie with others who also show strong team affiliation. Finally, the sport activity may be a central aspect of a consumer's life and daily routine such as their social life or exercise regime. Thus, for the consumer who has a strong emotional attachment to sport, sport offers a habitual, goal-directed, and pleasurable activity that provides of sense of belonging to a tribe representing something bigger and more important than the individual.

Despite the motivations people may have for being involved in sport, and notwithstanding how strong their attachment to it is, the week-to-week behavior of fans may still change. The decisions that fans make—such as whether to attend a game or buy some merchandise-will also be influenced by external factors. For example, fans are more likely to attend a game if they expect a close match with an uncertain outcome, although they will also be motivated if they expect that their team will win against a good opposition. The quality of the opposing team may also influence their decision, with fans more likely to attend if they expect high-quality play. A sports venue will attract more fans if it provides attractive and comfortable facilities, good views of play, easy accessibility, and a large scoreboard. Other external factors that may influence fans' decisions include the weather, which affects the quality of play and spectator comfort; the price; the appearance of "celebrity" players; the potential for a record-breaking performance; special promotions; and even what other leisure alternatives are offered.

In economic terms, sporting products tend to enjoy a low cross elasticity of demand, where it is not easy for competing sports leagues and competitions to be substituted for one another. Even where fans are unhappy about the result of a particular game or adjudication, it is unlikely that they would change their sporting preferences. In contrast, consumers of household products or health services would be expected to switch brands readily if they were dissatisfied with quality or price. Although this may seem exclusively advantageous to sports organizations, it means that it can be difficult to achieve market penetration or to encourage consumers to switch to their product through discounts or other incentives. As a result, sport managers and marketers find it more productive to encourage existing sport consumers to escalate their activity rather than work toward converting competitor's fans. However, there is always the hope for a good season where sport followers with limited interest tend to jump on the bandwagon.

GOVERNMENT RELATIONS

Governments have long considered sport a vehicle for nationalism, for the delivery of health benefits, and for social and economic development. As such, governments have adopted increasingly interventionist approaches through enacting policies and legislation to support, control, or regulate the activities of sport organizations, particularly in countries with community club-based sport systems such as Australia, Canada, New Zealand, and the United Kingdom. Most governments support elite training institutes to assist in developing athletes for national and international competition, provide funding to national sporting organizations (NSOs), support sport organizations to bid for major events, and facilitate the building of major stadiums. In return for this support, governments attempt to influence sport organizations to recruit more participants at the community level, provide services to diverse and disadvantaged sectors of the community, or have sports enact policies on appropriate alcohol and drug use, gambling, and general health promotion messages. Governments also regulate the activities of sport organizations through legislation or licensing in areas such as industrial relations and employment law, antidiscrimination, taxation, and corporate governance.

The influence of government policy on sport organizations is largely within the nonprofit sector of sport, which is generally termed community sport. NSOs are becoming increasingly dependent on federal government funding, particularly for Olympic sports, as governments seek to improve the performance of national Olympic teams and athletes in other elite sport competitions. This increased funding has led to most NSOs employing specialist staff to manage high-performance programs, specialist coaches, and other specialists in sports nutrition, biomechanics, exercise physiology, sports psychology, and skills training. This increased emphasis on elite sport is often justified because the elite element of each sport will provide role models and market exposure to the public and, thus, drive the level of mass participation up in sport. Sport organizations, therefore, have sought to increase the number and variety of sporting competitions and formats for elite competition and created a very crowded elite sport marketplace for sponsors and consumers. Some critics claim that the increased expenditure on elite sport has been to the detriment of the community levels of sport. Evidence suggests that the community sport system in many countries is under pressure due to underinvestment in building and maintaining community sport facilities, a diminishing pool of committed volunteers to manage the delivery of sport, and a reluctance by individuals to undertake roles such as officiating and administering voluntary sport organizations due to poor participant and spectator behavior and the threat of litigation from participants.

Sport organizations are also subject to institutional pressures to govern and manage themselves according to guidelines developed by government agencies such as the Australian Sports Commission (ASC), Sport and Recreation

New Zealand (SPARC), and Sport England. These guidelines and specific funding rules impose certain operating constraints on sport organizations with the result that the development of strategy and operational plans by sport managers must be made in the context of current and likely future government policy for sport. It is somewhat ironic that sport has been subject to increasingly interventionist approaches by governments while other sectors of the economy have been deregulated. This highlights the unique position of sport in its relationship with government in that it delivers many social benefits such as improved health of participants, national pride, and social cohesion that without government intervention may not eventuate. Managing sport organizations, particularly at the community level, will continue to require sport managers to understand the rationale and mechanisms that underpin government policies that affect sport.

SPORT REGULATION

In most industries, it is common for organizations to aspire to put their competitors out of business. This is not always the case in sport. In fact, sport organizations competing in leagues rely on the health of their competitors for their own success. Sport is one of the few products or services that benefit from a balance between competitors. In fact, sport leagues profit more at those times when it is difficult to predict who will win a match. Furthermore, when the outcome of a match is considered unpredictable, attendance numbers at the event are invariably higher. In other words, to remain successful sport organizations need their opposition to be successful as well. Indeed, in many cases, sport organizations are forced by their league to cooperate by sharing revenues and players in order to maintain competitive balance.

The idea of regulating sporting leagues in order to keep a fair and balanced competition is common in sporting competitions. Sport regulators typically believe that a balanced competition will produce exciting and close results, which will increase the level of public interest in the sport and generate larger attendances and broadcast rights fees. To achieve this, sport league regulators will often adopt structures and policies that have three key characteristics. First, they employ a centralized and independent decisionmaking body that regulates the member teams and clubs including administrators, players, and coaches. These rules may include how players are recruited and allocated, the number of teams allowed in the competition, where the teams are located, the length of the playing season, the design of the fixtures, and admission charges. For example, drafting rules and zoning schemes may determine that "recruits" must be allocated on the basis of team "need" or the players' places of residence, rather than according to personal choice or the best offer. This helps to ensure that no one team monopolizes the best players, and that each team has a reasonable chance of defeating an opposing team. Other rules established by a central body may even involve changing the rules of the game itself to make the sport more attractive to new markets or forms of distribution such as pay-per-view television. The regulating body is usually able to enforce disciplinary action upon those who breach the regulations.

Second, sport governing bodies will aim to expand revenue by imposing regulations that minimize costs and maximize financial viability. For example, rules may be imposed that restrict competitive bidding for players, total team expenditure on players' salaries may be set, and revenues may be redistributed so that every club has a minimum guaranteed income base. This helps to ensure that every team cannot only acquire their fair share of quality staff, coaches, and players but can also retain them by providing competitive remuneration.

Third, sport governing bodies will aim to increase revenue by extending the market for their sporting product, improving its overall attractiveness, and generally improving the status of the league in the community. The market, for example, can be expanded by admitting new teams to the league, extending the playing season, or playing games at different times of the week. The league's community standing may be heightened by a centralized promotion campaign that aims to improve the integrity, public image, and overall reputation of the sport. Regulators may also direct revenue to improve the quality of the game through programs to develop player skills, upgrade venues to make them more fan friendly, or provide maintenance to make playing surfaces safer. Governing sport bodies also tend to use their market power to maximize broadcast rights fees by negotiating as a single entity rather than through individual teams.

The agreements and arrangements made within professional sporting leagues to maintain competition and maximize revenue would be considered cartel behavior in other industries. A cartel is a group of firms who agree to act together as a single supplier to a market. Cartels are able to minimize competition, control the supply and cost of their products, coordinate advertising and promotion, set prices, protect the interests of members, and generally inflate revenue and profits. In most countries, cartels are illegal, since they act against the public interest by reducing competition. However, unlike more traditional industries, the sport industry is often allowed by government to pursue anticompetitive practices including extreme restrictions on the rights of players. This occurs because many governments accept that sport leagues perform poorly under free market conditions. A few dominant clubs, for example, could use their superior fan and revenue bases to capture the best players, dominate the competition, and reduce the uncertainty of which club will win a match or a season. This, of course, leads to reduced attendance at matches and, as a result, reduced interest from sponsors and the media. Therefore, while league regulation may be anticompetitive (or a restraint of trade), it is not generally considered unreasonable or against the public interest. While member teams are highly competitive and concerned with on-field dominance, they also understand that their long-term viability depends on a high-quality and well-balanced competition where teams are of comparable strength and ability.

STRATEGY IN SPORT

Strategic management involves analyzing an organization's position in the marketplace, determining its direction and goals, selecting an appropriate strategy, and then leveraging its distinctive assets to achieve its goals. Like any organization, the success of a sport organization may largely depend on the quality of its strategic decisions. It could be argued that nonprofit sport organizations have been slow to embrace the concepts associated with strategic management relative to professional sport organizations and, indeed, other types of organizations. This is arguably because nonprofit sport organizations have largely been controlled by volunteers who may be unfamiliar with or unwilling to adopt more formalized ways of managing their activities. In a competitive market, sport managers must drive their own futures by undertaking detailed market analyses, establishing a clear direction, and crafting strategy that matches opportunities. An understanding of strategic management principles and of how these can be applied in the specific industry context of sport is essential for future sport managers.

One of the biggest issues in sport strategy is finding the balance between two or more divergent obligations. For example, it is common for sport organizations to seek both elite success as well as improved participation levels. Balancing the allocation of resources between these is inherently difficult due to the high cost of competing in elite competition and the intensive work required to increase participation levels in sport where the competition for individuals' leisure time and discretionary income is fierce. As discussed earlier, it is commonly assumed that international success for a particular sport serves as a motivator for people to increase their participation. The success of high profile athletes might be the trigger for people to become involved in a particular sport. Similarly, interest in tennis among the public in Australia increases for a short period after the Australian Open but does not lead to longer term increases in participant numbers. One of the largest challenges for sport managers is to develop coherent realistic strategies, often with limited resources, to expand the market share enjoyed by their sport organization.

ORGANIZATIONAL STRUCTURE

An organization's structure is important because it defines where staff and volunteers "fit in" with each other in terms of work tasks, decision-making procedures, the need for collaboration, levels of responsibility and reporting mechanisms. Finding the right structure for a sport organization involves balancing the need to formalize procedures while fostering innovation and creativity, and ensuring adequate control of staff and volunteer activities without unduly affecting people's motivation and attitudes to work. In the complex world of sport, clarifying reporting and communication lines between multiple groups of internal and external stakeholders while trying to reduce unnecessary and costly layers of management is also an important aspect of managing an organization's structure. The relatively unique mix of paid staff and volunteers in the sport industry adds a layer of complexity to managing the structure of many sport organizations.

The distinction needs to be made here between organizational structures of elite sport organizations such as professional sport teams (i.e., Chicago Bulls, Manchester United Football Club, or the New York Jets) and the structures used by nonprofit sport organizations such as International Sport Federations (ISFs), NSOs and community sport organizations. To a large extent, the organizational structure of professional sport teams follow the usual principles of using functional criteria to create departments or divisions such as player management, marketing, ticketing, venue management, finance, or human resource management. In this sense, the organizational structures of these types of sport organizations are no different to other organizations. The structure of nonprofit sport organizations, however, is very different.

The structure of nonprofit sport organizations can be conceptualized as comprising five elements: members, volunteers, salaried staff, a council, and a board or management committee. The members of the organization may include individual players, athletes, participants, coaches, officials, administrators, and other individuals or, in some cases, organizations. Affiliated organizations that are classified as members can include clubs that compete in a league provided by a regional sports association or state/provincial organizations aligned with an NSO. The members (or their representatives) normally meet as a group once per year at an annual general meeting in a forum most commonly known as a council. The council comprises those people or organizations that are registered members and have been afforded voting rights on the basis of their membership status. One of the main tasks of the council is to elect, appoint, or invite individuals to a board charged with responsibility for making decisions throughout the year on behalf of the membership. The boards of nonprofit sport organizations normally comprise individuals who represent the interests of various membership categories, geographic regions, or sporting disciplines in decision making. If the organization is large enough, the board may employ an executive and other paid staff to manage the day-to-day affairs of the organization. The executive is employed by and reports directly to the board with other paid staff reporting to the executive. This structure means that sport managers work closely with a variety of volunteers to deliver programs and services in areas such as coaching, player and official development, marketing, sport development, and event delivery. This structure has been criticized for being unwieldy, cumbersome, slow to react to changes in market conditions, subject to potentially damaging politics or power plays between delegates, and imposing significant constraints on organizations wishing to change. However, most nonprofit sport organizations are structured this way as it enables members to be directly involved in decision making and ensures a certain degree of transparency in decision making.

Attempts to categorize sport organizations through the development of structural taxonomies have illustrated the varied nature of sport organizations at all levels of the sports system, as there are differences in the degree of formality, specialization, and centralization that exist within the structures of sport organizations. Sport managers and the volunteers who work within sport organizations also face structural issues such as a heightened potential for conflict due to the presence of staff and volunteers, the need to manage changes in formalization and centralization, the impacts of government policy in shaping organizational structures as discussed earlier, and industrywide changes as the sport industry has become more commercialized. In order to manage the impacts of these issues sport organizations need to adopt more formalized structures and management practices.

HUMAN RESOURCE MANAGEMENT

Human resource management (HRM) essentially involves developing and maintaining an effective and satisfied workforce. However, the sheer size of some sport organizations such as organizing committees for Olympic Games, which may involve more than 50,000 volunteers and staff, as well as the difficulties in managing the mix of volunteers and paid staff in the sport industry, make human resource management a complex issue for sport managers. Traditionally, HRM practices involve planning, recruitment, selection, screening, orientation, training, development, and performance management of human resources. If human resources also include volunteers, two additional functions of recognizing and rewarding volunteers should be performed by sport organizations. The application of HRM within sport organizations does not fundamentally differ from other organizational settings in terms of the relationship between the organization and paid staff, with three caveats. The first is that sport organizations such as professional sport teams may employ professional athletes or players who are paid many more times than the CEO, a situation that does not occur in other industry sectors. The second is that the market for recruiting professional athletes is highly regulated by leagues through mechanisms such collective bargaining agreements, standard playing contracts, and salary caps. The third caveat is the use of player or sports agents to represent the interests of individual employees (i.e., players or athletes), and the highly unionized employee market that exists in some leagues through players forming player associations or unions to represent their collective interests to league and team management.

The application of traditional HRM practices to managing volunteers, however, does have several significant limitations as outlined by Cuskelly, Hoye, and Auld (2006), which include the underlying assumptions of HRM, the lack of volunteer coordinators within nonprofit sport organizations, and the complexity of volunteer roles and perceptions of their experiences in nonprofit sport organizations. In community sport settings, sport volunteers can be considered simultaneously the owners of nonprofit sport organizations (as club or association members), unpaid workers expected to follow directives from other volunteers, and clients who are service recipients of the nonprofit sport organizations of which they are members. Each of these discrete formal organizational roles creates a set of expectations for individuals that sport organizations may not be able to meet. Cuskelly et al. argued that even the appointment of a volunteer coordinator, the equivalent to a human resource manager in other contexts, is unlikely to disentangle the complexity of volunteers' roles in sport organizations or lead to significant improvement in volunteer management practices in the short term.

The structure of sporting competitions and events also represents a significant point of difference for the application of HRM within sport organizations relative to other types of organizations. A significant proportion of sport is played on a weekly or seasonal basis within leagues and associations across the world. The regularity of the season and the competition, whether at the elite or community level, means that the staffing requirements of sport organizations are predictable and relatively stable. There are, however, a range of sporting events and championships for which human resource planning is difficult as staffing and volunteer levels fluctuate greatly. The human resource requirements for major sport events can be referred to as "heavily skewed" or "strongly peaked." In essence, major sport events need a large workforce, often composed primarily of volunteers or casual workers, for a short period prior to the event, during and directly following the event. The rapid increase and decline in staffing within a short period is a complex and significant human resource management problem. It requires systematic recruitment, selection and orientation programs in order to attract the staff, and simple yet effective evaluation and reward schemes in order to retain them.

SPORT CULTURE

There is no consensus about what the term *culture* means. In everyday language, it is often used to describe differences between groups of people based on their ethnic background or country of residence. However, the word culture has also been used increasingly over the past 50 years to

describe the behaviors and values of groups of people who constitute a submembership within a larger cultural group; for example, people may discuss the culture of university students, the culture of an organization, or the culture of European football fans. In this context, sport culture can be defined as a set of core values, beliefs, and attitudes that are common to sport, which set the standards for acceptable behaviors within the sport industry. In other words, people involved in sport (e.g., fans, athletes, clubs, and leagues) have unique ways of approaching and thinking about things. While these unique features may vary from sport to sport, or from context to context, they impact the way in which sport is managed from a business perspective.

What then are the unique features of sporting cultures? Broadly speaking, sport culture covers a wide range of dimensions such as attitudes, values, history, traditions, rituals (e.g., how success is celebrated and defeat dealt with), symbols (e.g., memorabilia and dress codes), and heroes. It can also be seen in the way people communicate (e.g., common phrases and body language), the clothes people wear, and the stories and legends they repeat.

One fundamental value evident in most sporting cultures is the sovereignty of success and victory. In fact, clubs may value on-field triumph at the expense of sound business practice; it is not uncommon, for example, for European football clubs to pay star players salaries that exceed the total annual revenue of the club—not sound business practice perhaps, but consistent with the cultural imperative of winning at all costs. The significance of winning is also reflected in the heroes of sport, who are commonly those athletes who can boast an outstanding record of on-field success. Despite the tenacity and accomplishment of an elite athlete, few people remember who came second, let alone last.

A strong competitive ethic is clearly the most prevalent system of performance evaluation in sport. This predominant value is often supported by a rigid disciplinary system, which reflects the idea that the club or sport is more important than the individual is. Thus, sport teams and clubs often revolve around powerful collectivism. Most sport teams demand loyalty, and the surrendering of the self to the greater good, but in return, they provide support and belonging. This extends beyond the playing field to the way in which sporting clubs, leagues, and businesses are operated. Sport organizations may expect employees to work unpaid overtime during evening training sessions and weekend games for the greater good.

Another common value seen in sporting cultures is the importance placed on traditional "masculine" traits such as toughness, aggression, the absence of fear, and the endurance of physical pain. Allied to this may be attitudes relating to the importance of women's versus men's sport, which is highlighted by the paucity of television coverage devoted to women's events. Networks and spectators may claim that men's sport offers superior physical performances in terms of strength or better drama through violent clashes; what this reveals is that strength and violence are considered by

many people to be pivotal features (cultural values) of attractive sport.

In addition to on field gender bias, many traditional male-dominated sports possess a gender role system with strong, stereotyped attitudes about the importance of officials and employees. This tends to result in a male-dominated culture, in which masculinity is rewarded. The roles of women in these sports may be limited to those of cheerleader or bikini-clad sign holder. Many sports also display a low level of tolerance for the unfamiliar. This has been shown through numerous sporting controversies involving the "outing" of homosexual athletes. From a business perspective, the homogenous and masculine culture of many sports presents a problem for future commercial development. For example, sport leagues and event organizers may have difficulty in expanding their market to attract more female fans.

The rituals and traditional ways of doing things in sport can also reveal the underlying culture of sporting clubs and codes. This may include traditional training methods that may emphasize discipline (e.g., repetitive drills) and aggression (e.g., verbal outbursts from the coach). There are also numerous social rituals associated with sport. The familiar motto "work hard, play hard" also highlights the importance of drinking alcohol in sporting cultures. Many sports are also tied closely with a history of gaming.

The history of a club or sport, in fact, may play a powerful role in determining many cultural attitudes and values in sport. Club colors and the location of a home ground are two common elements of sporting club history that prove difficult to change. Fans, athletes, and clubs may also resist changes to the rules of sport such as changes to the duration of a game to make a sport more media friendly. Many traditional sport organizations may value history, tradition, and the familiar and, as a result, may put little emphasis on long-term planning to cope with the rapidly changing sporting environment. From this point of view, many sport organizations face significant challenges in the contemporary sport environment where they are confronted with increasing pressure to adapt tradition to cater for commercial opportunity.

Like all living cultures, sport is incessantly changing, dynamic in nature and subject to constant reinterpretation by its participants. Contemporary sport is faced with many challenges in order to maximize media exposure, expand into new markets, and maintain profitability. The traditional values and attitudes of sport may elicit strong attachments from some fans, but they also limit the flexibility of sport organizations to respond to changing market demands and increasing competition from other entertainment alternatives. As a result, many sports are attempting to align their cultures with business practices, through efforts such as controlling alcohol intake and crowd aggression at games to make them more "family friendly." While traditional gender biases and many aspects of history and ritual may be challenged as sport becomes more of a business, some things seem sure to remain: the pursuit of competition, the love of winning, and the ability to summon strong emotional responses in both victory and defeat.

SPORT GOVERNANCE

Organizational governance involves the exercise of decision-making power within organizations and provides the system by which the elements of organizations are controlled and directed. Governance is a particularly important element of managing sport organizations, many of which are controlled by elected groups of volunteers as discussed in the earlier section on organizational structure. Appropriate governance systems help ensure that elected decision makers and paid staff seek to deliver outcomes for the benefit of the organization and its members and that the means used to attain these outcomes are effectively monitored. As many sport managers work in an environment where they must report to a governing board, it is important that they understand the principles of good governance and of how these are applied in sport organizations. The boards of nonprofit sport organizations are vital for the continued effective delivery of sport opportunities to members, participants, spectators, and the wider community because they are the core decision-making authority with responsibility for organizational strategies and the management of risk. Sport organization boards are central to the development of organizational culture, leadership, and ultimately organizational performance. Sport managers in most sport organizations will work for a volunteer board, unlike their corporate counterparts who work for individual owners or paid directors.

There are several unique aspects of sport governance as outlined by Hoye and Cuskelly (2007). First, the threat of litigation against sport organizations, their members, and board members has forced sport organizations to address issues such as risk management, fiduciary compliance, incorporation, directors' liability insurance, and board member training and evaluation. Second, the heightened awareness of the implications of governance failure due to several much publicized corporate cases of impropriety worldwide has forced sport organizations to improve their governance systems. Third, legislative changes to address issues of equity and diversity are additional pressures sports organizations must face and their governance systems, particularly membership criteria, voting rights, and provision of information must change accordingly. Finally, the threat of competition in the marketplace has also forced sports organizations to become more commercial and business focused, primarily through employing paid staff.

PERFORMANCE MANAGEMENT

Sport organizations over the last 30 years have undergone an evolution to become more professionally structured and managed and have applied generic management principles to marketing their products, planning their operations, and managing their human resources and other aspects of organizational activity. The unique nature of sport organizations, however, and the variation in missions and purposes has lead to the development of a variety of criteria with which to assess the performance of sport organizations. Sport management students need to understand the ways in which organizational performance can be conceptualized, analyzed, and reported and how these principles can be applied in the sport industry.

Hoye, Smith, Westerbeek, Stewart, and Nicholson (2006) argued that sport is different from business which has significant implications for the way in which performance is measured and managed. First, it has a symbolic significance and emotional intensity that is rarely found in an insurance company, bank, or even a betting shop. While businesses seek employee compliance and attachment, their primary concern is efficiency, productivity, and responding to changing market conditions. Sport, on the other hand, is consumed by strong emotional attachments that are linked to the past through nostalgia and tradition. Romantic visions, emotion, and passion can override commercial logic and economic rationality. Second, predictability and certainty, which are goals to be aimed for in the commercial world, particularly with respect to product quality, are not always valued in the sporting world. Sport fans are attracted to games where the outcome is uncertain and chaos is just around the corner. Third, sport is not driven by the need to optimize profit in the ways that large commercial businesses are. In practice, sport organizations face two conflicting models of organizational behavior when deciding upon their underlying mission and goals: the profit maximization model, which assumes that a club is simply a firm in a perfectly competitive product market and that profit is the single driving motivational force; and the utility maximization model, which emphasizes the rivalry between clubs and their desire to win as many matches as possible. The utility view assumes that sporting organizations are by nature highly competitive and that the single most important performance yardstick is competitive success.

A systematic approach to performance management enables a sport organization to identify strengths and weaknesses, and identify the ways in which overall organizational performance can be improved. Performance management also assists in deciding where scarce resources should be allocated and benchmarking organizational performance with competitors. A performance management system should be linked to an organization's goals and objectives, which in the case of sport organizations, may be quite different from those of business organizations. While commercial entities generally focus on maximizing profits, sport organizations are more likely to be concerned with priorities like winning more games than their rivals, and servicing the needs of members. This multiplicity of goals for sport organizations makes it difficult to determine an overall measure of organizational performance.

SUMMARY

This chapter has highlighted the fact that managing sport organizations requires the application of management theories, principles, and strategies that are no different to managing organizations in the corporate, government, or nonprofit sectors. The unique attributes of sport organizations, however, influence how these theories, principles, and strategies are applied by sport managers. Students seeking to explore these unique attributes, namely, consumer behavior, the relationship between sport and government, regulatory regimes, strategy, organizational structure, human resource management, organizational culture, governance, and performance management will find them to be interesting research topics. The following references are excellent starting points for further investigating the unique area of sport management.

REFERENCES AND FURTHER READINGS

- Beech, J., & Chadwick, S. (2004). *The business of sport management*. London: Pearson Education.
- Cuskelly, G., Hoye, R., & Auld, C. (2006). Working with volunteers in sport: Theory and practice. London: Routledge.

- Downard, P., & Dawson, A. (2000). *The economics of professional team sports*. London: Routledge.
- Hoye, R., & Cuskelly, G. (2007). Sport governance. Oxford, UK: Elsevier Butterworth-Heinemann.
- Hoye, R., Smith, A., Westerbeek, H., Stewart, B., & Nicholson,M. (2006). Sport management: Principles and applications.Oxford, UK: Elsevier Butterworth-Heinemann.
- Jarvie, G. (2006). *Sport culture and society*. London: Routledge. Nicholson, M. (2007). *Sport and the media: Managing the nexus*. Oxford, UK: Elsevier Butterworth-Heinemann.
- Parkhouse, B. L. (2005). The management of sport: Its foundation and application (4th ed.). New York: McGraw Hill.
- Parks, J. B., & Quarterman, J. (2003). *Contemporary sport management* (2nd ed.). Champaign, IL: Human Kinetics.
- Quirk, J., & Fort, R. (1999). *Hard ball: The abuse of power in proteam sports.* Princeton, NJ: Princeton University Press.
- Sandy, R., Sloane, P., & Rosentraub, M. (2004). *Economics of sport: An international perspective*. New York: Palgrave Macmillan.
- Slack, T. (Ed.). (2004). *The commercialization of sport*. London: Routledge.
- Slack, T. (2005). *Understanding sport organizations: The application of organization theory* (2nd ed.). Champaign, IL: Human Kinetics.
- Westerbeek, H., & Smith, A. (2003). Sport Business in the global marketplace. London: Palgrave Macmillan.

100

Managing Philanthropic Organizations for Creativity

DIANA LEAT

Center for Civil Society

HELMUT K. ANHEIER

University of California, Los Angeles

his chapter discusses the management dilemmas of foundations, the roots of these, and the ways in which they are handled. As foundations exist in many forms and types, it is useful to define them at the onset of this chapter: Foundations are organizations that control and distribute *assets*, financial or otherwise, with the following characteristics:

- · Non-membership-based organization
- Private entity
- · Self-governing entity
- Nonprofit-distributing entity
- · Grant-making entity
- Serving a public purpose

Over time, foundations have adopted different models or approaches that provide legitimacy for their purpose, ways of operating, including management styles, and expected and actual impact.

CHARITY

The first approach, charity, the original model, was in many ways well suited to the social and political context of the 19th century. With inadequate provision by nonprofits and government, foundations provided services to those unable

to care for themselves. As governments increasingly began to provide some services for some groups, foundations adapted the service approach to provide services complementary to those of government or to fill gaps in statutory provision. Until the early 20th century, this approach was probably effective; yet, it had and continues to have major shortcomings that prevent foundations from exploiting their fullest potential. First, the charity approach makes a difference to those lucky enough to benefit from the service but, taken alone, has no impact beyond that. Second, the approach tends to operate on the now largely false expectation that someone else will take up the job of widening and sustaining impact. Traditionally, it was assumed that what foundations start, government will and should continue—an assumption that no longer holds. Moreover, this approach can be and is adopted by other nonendowed or noncharitable organizations, such that a distinct role for foundations is no longer obvious. Finally, the charity model addresses symptoms rather than causes. In an important sense, the charity approach changes very little. This was the key criticism that led to the rise of the philanthropic/scientific foundation approach.

PHILANTHROPY

This approach is different from charity in its emphasis on dealing with causes rather than symptoms of problems.

Again, the rise of the philanthropic foundation was a product of its time. In the early to mid-20th century, belief in the power of a "scientific approach" was riding high, as was the notion of social engineering. Social, medical, and economic problems could all be solved once their causes were understood and scientific solutions applied. For all the achievements of the philanthropic/scientific approach, it too suffers from some weaknesses when viewed from a 21st-century perspective.

First, like the charity approach, the philanthropic approach fails fully to exploit the unique potential of endowed foundations. For the most part, this approach can be and is adopted by other kinds of organizations as well. Second, it rests on assumptions that may be true in physical science but are questionable when applied to social issues. If the causes of something as complex as, say, poverty are identifiable, they may not be susceptible to scientific solutions and simple control measures. Third, while the philanthropic approach has much wider potential impact, it often fails to appreciate the long, slow, complex, and expensive path to effective problem solving.

STRATEGIC PHILANTHROPY

In recent years, new approaches have been added to the foundation lexicon that include strategic philanthropy, venture philanthropy, blended value, and so forth. They are, in many respects, descendants of scientific philanthropy. While they have stimulated healthy debate, some fundamental weaknesses remain, stemming in part from their instrumentalist, managerial assumptions. First, they tend to focus on foundation processes rather than roles, and do not address the question of the unique value of foundations in a democracy. Second, they apply business models to foundation practices, with the assumption that if only foundations were run like businesses, all would be well. While these models have something to offer, they are inappropriate guides to achieving social change. Social change is a negotiated, contested, and political process. It is not simply a matter of better management. The complexity of social problems is such that their resolution is never in the hands of one actor. Particularly if the actors, like foundations, do not have the resources commensurate with the problem at hand.

CREATIVE PHILANTHROPY

This is the latest approach, developed in response to the shortcomings of the existing models by Anheier and Leat (2006). Creative foundations do not engage in either charity or scientific philanthropy (i.e., seeking out the causes of problems)—the two historically dominant phases of foundation thinking. Nor do they engage in venture philanthropy, strategic philanthropy, and the related new approaches. Creative foundations seek to

- exploit their distinctive characteristic of freedom from market and political constraints to make a unique contribution to democratic debate and enhance the problem solving capacity of society, and
- maximize the breadth and sustainability of their impact (Anheier & Leat, 2006).

The approach is creative in that it seeks to provide new ideas and solutions to enduring social issues; takes an imaginative approach to foundation resources; seeks to establish links between people, ideas, knowledge, and practice; works across conventional boundaries; and employs practices and techniques different from those of conventional foundations (Anheier & Leat, 2006).

APPROACHES TO FOUNDATION MANAGEMENT

Typically, the foundation management literature addresses two central issues: board management—that is, how the board makes decisions and implements them—and grantee management—that is, how funds are allocated, disbursed, and accounted for (see, e.g., Orosz, 2000; Prager, 2003). These foci are reflective of a more narrow vision of what foundations do and they cast them as seemingly insular funding agencies with set patterns of operations. By contrast, we take a broader view of foundation management and suggest that managing a creative approach goes well beyond board and grantee management. At the same time, and in line with modern management literature (see Magretta, 2002), we argue that no management model fits all circumstances equally well, and like organizational design itself, management approaches are context and task specific.

The management of foundations, like that of any other formal and goal-oriented organization, involves three critical aspects (Magretta, 2002). First, the chief responsibility of management is value creation in relation to the organization's stated mission and goals. For example, if the mission is to bring about greater social justice, support the arts, or help the homeless to gain paid employment, all management activities should contribute to the stated objectives around that mission: value creation toward social justice, toward the arts, or for fighting homelessness. In this sense, foundation management is all about how a mission is to be accomplished within the guidelines established in the deed and as interpreted by the board.

Second, within such guidelines, management involves making critical, clear, and consistent choices. This means weighing trade-offs and establishing boundaries. It is as much about what to do well as it is about what not to do at all. Given a limited deed, making choices and setting priorities may be easier but restricts the space and ways in which a foundation can grow and change over time as circumstances change. The challenge here becomes one of maintaining relevance. By contrast, having a very broad set of guidelines makes goal and priority setting more complex,

and the challenge for management is focus and consistency around some medium- to long-term vision. At the same time, change is easier as more options are possible and can be explored.

Third, the organizational design and management style are not only contingent upon mission and goals but also on the task environment in which the foundation finds itself. The term task environment refers to the specific elements with which the foundation interacts in the course of its operations. This includes first and foremost the nature of the product or service provided and the grantees, clients, or audiences involved. Clearly, it will make a difference for organizational design if the foundation seeks to influence long-term policy change, supports disaster relief overseas, awards scholarships to disadvantaged students, or runs homes for the frail elderly.

Orosz (2002) identified seven challenges and seven tradeoffs in conventional foundation management. In summary, the challenges are that inexperienced foundation managers are expected to deliver results with untrained staff, with staff who have little in common, face few external pressures for improvement, with boards who do not share the ideologies of staff who themselves are ideologically divided. Orosz concluded that given these challenges the wonder is "not that there is some poor performance in the foundation world, but rather that there is so much good—even excellent—performance" (p. 5).

The "inevitable trade-offs" in foundation management are, first, high overhead for a full-service foundation versus low overhead to maximize spending on grants; and second, strategic planning for focus versus flexibility to make the most of unforeseen opportunities. The third trade-off is between specialism for depth and generalism for breadth (Orosz, 2002, p. 6). The fourth trade-off is between relying on experts and relying on people in communities that have practical experience with the issue; the more a foundation relies on one, the less credibility it is likely to have with the other. Orosz's fifth trade-off is between high uncertainty, risky projects that have the potential for great results, and low uncertainty, safer projects that are more likely to deliver mediocre results. The sixth trade-off is between high profile and low, or no, profile; the latter is safer and more comfortable, the former may be more effective for some purposes: "Harry Truman was right. If you can't stand the heat get out of the kitchen. But if you get out of the kitchen, don't expect to have a guaranteed place at the table" (p. 8). The final trade-off is between the "individual entrepreneur" and "managed team" approaches to grantmaking: "A free wheeling entrepreneur will suffocate on a managed team, while a managed team member will feel adrift in an undefined entrepreneurial environment" (p. 8). Trying to operate managed teams of entrepreneurs is, according to Orosz, doomed to failure.

Creative foundations face many of the challenges identified by Orosz (2002). But rather than seeing them as problems to be solved, creative foundations see them as

productive tensions to be exploited. Similarly, although creative foundations are conscious of Orosz's trade-offs, they see these not as matters of either/or but rather as not only/but also. However, creative foundations face other challenges. As discussed further in the following, creative foundations illustrate that management models, challenges, and trade-offs are context and role/task specific.

As previously outlined, creative foundations see their roles as using their unique freedom from political and market pressures to stimulate creative, constructive, conversation, debate, and action, enhancing the problem-solving capacity of society and contributing to civic engagement and democracy. What are the management implications of this, and how do they relate to Orosz's (2002) challenges?

Orosz's Challenges

Lack of Opportunities for Preemployment Education and Training

Orosz's (2002) first challenge faced by foundations is lack of opportunities for preemployment education and training. Because creativity and innovation, in conception and implementation, typically involve reaching across established boundaries, creative foundations see their position as critical boundary spanners in modern society, sitting on the edge of an array of institutions, disciplines, and professions, as a resource to be nurtured. Given this philosophy, creative foundations see diversity among staff and between board and staff as an advantage, and they deliberately set out to recruit both board and staff members from diverse backgrounds, with diverse skills.

Staff from outside the mainstream foundation world bring new skills and approaches to attacking old problems and may be better able to cope with the move from a charity to a creative approach and the lack of immediate satisfactions of dispensing grants to grateful recipients. Without training in the foundation world, staff come to the foundation unencumbered by traditional assumptions and expectations; they are better able to break from the past and see foundation roles and strategies, as well as the issues they address, in new ways. Diversity and lack of training in the foundation world enhances variance—a powerful tool in encouraging creativity.

In addition to looking for different qualities for existing posts, given the range of tasks involved in adopting a creative approach, new and different staff are needed, for example, staff with skills in communications, evaluation, and so on. While conventional foundations tend to be largely comprised of program officers with a broadly shared set of skills and cultures, the manager of a creative approach has to manage the competing norms, values, demands, and expectations of a variety of different professions and disciplines. Communications staff may see things very differently from program staff, and both may see things differently from evaluation staff.

Lack of a Cohesive Culture

Lack of a cohesive culture, according to Orosz (2002), stems from "a riotous diversity of education and work experience. The result is divergent world views, diverse priorities, even different ways of perceiving and knowing" (p. 3). For creative foundations, divergent worldviews are an advantage enabling the foundation to get out of the rut of conventional definitions of roles, resources, problems, and solutions and to attack an issue from several different sides. Accepting that innovation is encouraged in situations of overlap in cultures and networks, creative foundations will often go further by actively seeking out dissenting voices and creating opportunities for bringing diverse perspectives together both internally and externally.

Diversity in backgrounds and perspectives may imply lack of a cohesive culture but does not necessarily imply lack of cohesion. In creative foundations, cohesion comes from a common commitment to the role and values of the foundation and the outcomes it seeks. Outcomes sought and appropriate strategies are arrived at through iterative discussion involving staff and board members, with different perspectives, each contributing a different part of a jigsaw that joins achievable outcomes with coherent grantmaking, communication, and learning strategies for change.

Lack of a Salutary External Discipline

For creative foundations, freedom from the constraints of pleasing customers or constituencies is one of their defining characteristics and greatest strengths. This "lack of external discipline" enables them to be creative, to think the unthinkable, to challenge conventional approaches, to take risks, to take a long view, and to add to the variety and richness of democratic debate. Rather than encouraging them to avoid rocking the boat (as Orosz, 2002 suggested is true of most foundations), awareness of this characteristic enables them to "rock the boat." Again, it is creative foundations' clear analysis of their unique strengths and roles that turns lack of external discipline into a motivating rather than an enervating factor. The conventional foundation culture of not rocking the boat comes not from lack of an external discipline but from foundations' failure to recognize that their unique role arises from precisely that freedom.

But without an external discipline, where is the incentive for learning and improving? Whereas many conventional foundations start with foundation-generated programs, rules, and ways of doing things, creative foundations start with an outcome they seek to achieve. Following on from the outcome, the creative foundation analyzes who or what would have to change to achieve that outcome, how that might be achieved, and what would count as success along the way. Incentives for learning and improvement come from regular review against those milestones, encouraging the foundation to question, "Is this working?" and "If not,

where are we going wrong, what has changed, what are we missing and how can we improve on that?"

In an important sense, the quest for learning and improvement is built into the culture of creative foundations in two other ways. First, the decision to adopt a creative approach often arises from dissatisfaction with conventional approaches (as in the case of The Wallace Foundation). Part of the management task in a creative foundation is to maintain "constructive dissatisfaction," always looking for ways in which the foundation could do better. Second, the quest for improvement and learning is built into the culture of creative foundations via their definition of their roles. Learning how to do things better, where the obstacles to change are, and so on, and sharing that learning with others is part of what creative foundations are about.

Lack of Reliable Feedback

In theory, creative foundations are as prone to lack of reliable feedback as any other foundation. In practice, they manage this problem by redefining feedback not as praise or blame, but as mutual learning. They develop often long-term relationships with grantees, beneficiaries, and target groups in which learning how to see or do things better is the common goal. Learning what does not work is as important as learning what does. The enterprise is not about success and failure but about learning and improving.

Creative foundations often actively cultivate critics, recognizing that

Active critics are a great asset. Without the slightest expenditure of time or effort, we have our weakness and error made apparent and alternatives proposed. We need only listen carefully, dismiss that which arises from ignorance, ignore that which arises from envy or malice and embrace that which has merit. (Hock, 2002)

Bringing those with opposing views into meetings stimulates creativity, promotes learning and provides an opportunity for the creative foundation to broker dialogue.

Lack of an Accepted Body of Best Practice

Given the lack of a common baseline, foundation workforces tend to become like Garrison Keilor's Lake Woebegone, where all the children are above average. It isn't so, of course, but in the absence of generally accepted standards, who's to argue? (Orosz, 2002, p. 4)

Creative foundations certainly work in an environment with no accepted body of best practice. But beyond some basic ethical, due diligence and reporting standards, it is unclear whether an "accepted body of best practice" is a desirable or feasible goal. An accepted body of best practice might be comforting, but would it foster real innovation and change? For conventional foundations that see their role as

dispensing grants to achieve specified outputs/outcomes, an accepted body of best practice has some obvious applications and attractions. But for creative foundations who see their role not as dispensing money, but rather as using a range of tangible and intangible resources, including knowledge and networks to promote creative debate and change, the feasibility and desirability of an accepted body of best practice are less clear. For creative foundations, innovation and change are not seen as working to fixed standards and patterns. There is no one surefire route to achieving change because circumstances alter cases and change changes. What may be best practice in one case may be inappropriate and unhelpful in another.

Lack of Ideological Cohesion

Orosz's (2002) sixth and seventh challenges facing foundations are lack of ideological cohesion between board and staff and within the staff itself. As previously discussed, creative foundations welcome-indeed, deliberately seek out—diversity in backgrounds, experience, and perspectives. The foundation's ideology is to be creative, to use its unique position and resources, and to have an impact beyond its immediate grantees by raising awareness and contributing to informed, constructive conversation and public debate. Creative foundations are driven by a constant desire to improve and to learn how to do it better, positively encouraging critical review. In short, ideological cohesion comes from valuing different viewpoints, skills, and contributions. The CEO's role is to ensure that diversity is harnessed for creativity rather than descending into paralyzing chaos.

Staying focused on the role and tasks of the creative approach requires constant attention, including "keeping the board onboard." Creative foundations studied emphasized the need to ensure genuine involvement, regular and informative (as distinct from cursory) updates on current work and progress evaluations, and advance warning of any looming controversies (see also Carson, 2003).

The manager of a foundation adopting a creative approach also has to build ideological cohesion around the foundation's role among staff. Staff may be more resistant to change than the board. In relation to building both board and staff commitment, creative foundations recognize that achieving change is a campaign, not an event. Managers should not expect people to embrace the need for change easily; the manager's job is to create a readiness to change by encouraging dissatisfaction with current achievements and ways of doing things. Readiness comes from dissatisfaction, from education, and from guiding people to conclude that change is necessary.

Creative Foundations and Orosz's Trade-Offs

Although creative foundations face many of the issues identified by Orosz (2002) as "trade-offs," they tend to see

these not as choices but rather as givens or as combinations. Foundations adopting a creative approach have to be "ambidextrous organizations," mastering the art of "not only/but also" (Tushman, Anderson, & O'Reilly, 1998).

High Overhead Versus Low Overhead

Creative foundations tend to have higher overheads than many mainstream foundations not least because they attach considerable significance to and spend considerable time on research and thinking prior to getting involved in an issue, to learning from and adjusting strategies as they go along, and to communication of issues and learning to a variety of others. Because foundations adopting a creative approach start with an outcome, spending is largely, within limits, driven by what it takes for grantees and for the foundation to achieve that outcome.

Whereas conventional foundations generally believe that the lower their overhead costs the better, the foundation adopting a creative approach sees overhead costs in terms of what is necessary for foundation effectiveness. If this means slipping over into operating, with all the implications of that for percent overhead costs, then this too is accepted. Spending and overhead is, however, somewhat reduced by creative foundations' willingness to use their networks to borrow brains and other resources from others. Although creative foundations are wary of becoming overly "padded," they do not see a higher overhead than conventional foundations as a problem per se. "Overheads" are the cost of effectiveness and following through to the outcome they seek, rather than dropping the baton half way through the race. Overheads are the price foundations pay to add value via their reputation, knowledge, and networks.

Strategic Planning and Flexibility

Adopting a creative approach involves focus and flexibility. In order to build reputation and credibility, to develop sound knowledge, and to build rich networks in a particular field, creative foundations focus on a small number of priorities in a limited number of fields. But creativity requires space and freedom. Flexibility is also necessary to take advantage of unforeseen opportunities, new points of access, and leverage for change. Creative foundations spend time scanning the environment, keeping up with changes, and spotting trends, newly opening policy windows and new issues.

Creative foundations are strategic in the sense that they focus on a limited number of issues and in that they analyze who and what has to change, how they can be reached, and what resources the foundation has to achieve that. They spend time planning strategy but, because they recognize environmental complexity and dynamism, and that social and policy change involves seizing opportunities, the plan is seen as a flexible framework from which to depart. Strategic planning and flexibility are not either/or but and/and.

Broad Versus Deep

For creative foundations, the issue is not broad versus deep knowledge but rather broad and deep knowledge. Creative foundations build up and on their knowledge at different levels, engage in active knowledge management, involve grants officers with first-hand knowledge more fully in executive decision making, and seek more diverse board compositions to draw in different experiences and knowledge sets. They need deep knowledge, not least for reputation and legitimacy, but they also recognize the innovative power of both acquiring and spreading knowledge broadly. Working initially in a limited number of innovation sites that are varied in character and composition is one way in which they marry deep and broad knowledge. Working in innovation sites also enables them to see issues holistically—another way of using breadth to deepen knowledge and stimulate creative perceptions of problems and the resolution. Working at different levels—for example, local and national—has a similar effect.

Community Based Versus Expert Based

Again, for creative foundations community- and expert-based knowledge is not a matter of either/or, but one of not only/but also. Because innovation tends to come from the margins rather than from the mainstream, creative foundations recognize that they need to work in different places and at a variety of levels. Creative foundations see this ability to work across boundaries in different places as one of their unique assets. Foundations' independent resources mean that they can develop relationships with the powerful and the powerless and with the rich and poor and that they are free to mix disciplines and professions. Foundations can converse with everyone and be dependent on none.

Private foundations have no generalized authority. Foundations cannot, for example, raise taxes or make laws. Unlike many other nonprofit and religious organizations, foundations cannot claim authority derived from membership or representation. Foundations adopting a creative approach recognize the importance of authority in intervening to make a difference, and their lack of democratically derived authority. Although such foundations may use the composition of their board to gain/borrow some authority (and may select board members to that end), they know that neither this nor their money is sufficient alone. Foundations adopting a creative approach deliberately set out to *earn* authority through what they know and do. They engage in the slow, arduous process of building expertise and reputation as reliable, credible authorities in particular domains.

They build their reputations as authorities in a particular domain by demonstration projects, site initiatives, research, and wide communication of the findings derived from these initiatives. Many such foundations' authority-building activities combine a variety of styles; they marry a wide, statistically robust overview with anecdotes, case studies,

listening to people, on-the-ground experiments, and data. This is a very different approach from that condemned by conservative foundations distrustful of university researchers and professionals (see, e.g., Schambra & Shaffer, 2004). By combining qualitative and quantitative and the emotional and the objective, and by appealing to hearts and minds, foundations adopting a creative approach draw on two very different sources of popular authority: experiential and rational. Combining and synthesizing expert- and community-based knowledge is one of the ways in which creative foundations use their unique position between institutional fields and boundaries to add value.

High Uncertainty Versus High Certainty

For creative foundations high uncertainty and high certainty are not trade-offs or choices. Uncertainty is simply a fact of life for these foundations. This is true for at least four reasons.

First, creative foundations accept that they work in complex and dynamic environments. Second, innovation involves risk and uncertainty. This means that foundations wanting to innovate have to embrace uncertainty, be open about it, and not hide behind demands for short-term performance and output indicators or safe funding practices to justify their legitimacy. Supporting innovation has to take the risk of failure into account. The important point is that foundations, unlike other institutions, can afford to absorb such risks. Third, the outcomes the foundation seeks to achieve usually require long-term commitment, and in the short term, there may be few obviously visible results. Board members and staff need to remain confident and committed. Several of the foundations studied suggested that board members more easily cope with the "slow burn" marathon of the creative approach if the foundation also has some more immediately satisfying shorter term projects/ grants. Another strategy to ease the ache of the slow burn may be to ensure some early results by knocking at already half-open policy doors.

Achieving the often long "drip drip" of social change is especially frustrating in a culture that likes to be constantly keeping score and moving on. However, the process of change in organizations and in society is

more like a soccer match; you have to appreciate the seemingly endless positioning that precedes the sporadic scoring . . . the progress resulting from discontinuous change is actually the sum of dozens, even hundreds, of difficult and unheralded events that together keep the battleship turning in the right direction. (Lawrence, 1998, p. 307)

Selecting milestones and trumpeting the small successes along the way are important comforts on the journey.

Fourth, because foundations adopting a creative approach accept that change is an uncertain process affected by a variety of foreseeable and unforeseeable, of known

and unknown, and of actors and factors, they accept that the foundation's role in achieving any given outcome is always uncertain and often unknowable with any precision. For this reason, foundations adopting a creative approach accept the value of soft performance measures. They also accept, and have to live with, uncertainty over their precise role in achieving desired outcomes. Adopting a creative approach requires courage and humility.

All of this is easier to say than to do, not least because it goes against the grain of conventional management wisdom. Adopting a creative approach, building innovation, and learning requires for staff and grantees

- 1. de-emphasizing individual accountability—focusing on goals rather than assigning blame and responsibility;
- avoiding quantitative goals and overrigid budgets—asking people to be innovative without departing from plans, budgets, and standard operating procedures does not work;
- 3. not punishing mistakes; failing early and often is better than failing once at the end of a program; and
- 4. discouraging internal competition. (Pfeffer, 2002, p. 102)

High Profile Versus Low Profile

Recognizing that innovations are controversial and defining their role in terms of stimulating debate, unlike many conventional foundations, creative foundations do not shy away from controversy and the public eye but are open about what they fund and for what reasons. Creative foundations accept that innovation is not just a matter of new ideas and practices but also often a political process in the sense that change requires challenging existing accepted thinking, policies, and practices, whether at the level of government, organizations, or the public. Because communication is an essential part of the creative foundation's task, having a high media profile is seen as a good rather than a bad or optional thing.

But at the same time, creative foundations manage their profile and, on occasions, may choose to maintain a lower profile. Their aim is not so much to bring attention to the foundation but rather to the issues—that is the balance they seek rather than one between a high and low profile per se. It is also important to have the right sort of high profile. Creative foundations work to build a high profile based on knowledge, experience, and political neutrality. The soundness of their knowledge, as well as their careful use of language, is seen as their protection against accusations of being partisan.

Entrepreneurs Versus Teams

A creative approach requires flexibility and opportunism, thinking outside of the box, and working across boundaries. As previously discussed, creative foundations are

knowledge and social issue entrepreneurs. But at the same time, the foundation needs teamwork, structure, and process to get things done. Creativity without process becomes unmanageable, but process without creativity becomes meaningless routine. The manager's task is to balance the two forces in "creative abrasion" (Brown & Duguid, 2002). Again, a passion for achieving the outcome sought, as well as recognition that getting to the outcome requires team entrepreneurship and different skills, provides important cohesion and discipline.

Nevertheless, creative foundations face challenges similar to those identified by Kao (1996) discussing managing creativity in business:

- · Can you have creativity on demand
- How to balance the need for freedom with the need for structure
- How to balance desire for unlimited development time with desire for deadlines
- How to balance participation and informal communication with the need for hierarchy and structured authority
- How to design useful systems for planning, resource allocation, and information flow
- How to manage conflicts between the creative and the managerial
- How to identify the potential value in such conflicts

CONCLUSION

This chapter suggests that management challenges and trade-offs are not the same for all foundations but are related in important ways to how foundations see their roles and task environment. We have focused on foundations that see their unique roles as requiring high creative and entrepreneurial capacity and their task environment as uncertain in terms of both complexity and dynamism. Exploring the management implications of this approach involves moving away from technocratic, rationalist management models to embrace a management concept more fully in tune with the realities of these foundations.

NOTE

1. This chapter draws on recent research into foundations adopting a creative approach in the United States, the United Kingdom, and Australia (Anheier & Leat, 2006; for a review of nonprofit management more generally, see Anheier, 2005).

REFERENCES AND FURTHER READINGS

Anheier, H. K. (2005). *Nonprofit organisations theory, management, policy*. London: Routledge.

Anheier, H. K., & Daly, S. (2006). Foundations in Europe: Roles and visions. London: Routledge.

- Anheier, H. K., & Leat, D. (2006). *Creative philanthropy*. London: Routledge.
- Brown, J. S., & Duguid, P. (2002). *The social life of information*. Boston: Harvard Business School Press.
- Carson, E. (2003). A foundation's journey into public policy engagement. In F. Ellsworth & J. Lumarda (Eds.), *From grantmaker to leader: Emerging strategies for 21st century foundation* (pp. 157–174). Hoboken, NJ: John Wiley.
- Hock, D. (2002). The art of Chaordic leadership. In F. R. Hesselbein & R. Johnston (Eds.), *On mission and leadership* (pp. 63–74). San Francisco: Jossey-Bass.
- Kao, J. (1996). Jamming: The art and discipline of business creativity. New York: Harper Collins.
- Lawrence, D. M. (1998). Leading discontinuous change: Ten lessons from the battlefront. In D. Hambrick, D. Nadler, & M. Tushman (Eds.), How CEOs, top teams and boards steer transformation (pp. 291–308). Boston: Harvard Business School Press.
- Magretta, J. (2002). What management is: How it works and why it's everyone's business. New York: Free Press.
- Orosz, J. L. (2000). The insider's guide to grantmaking: How foundations find, fund, and manage effective programs. San Francisco: Jossey-Bass.

- Orosz, J. L. (2002). *Terra incognita: Poorly understood challenges and trade-offs of managing private foundations.* Paper presented at the Waldemar A. Nielsen Issues in Philanthropy Seminar Series, Georgetown University Center for Public and Nonprofit Leadership, Washington, DC.
- Pfeffer, J. (2002). To build a culture of innovation, avoid conventional management wisdom. In F. Hessselbein, M. Goldsmith, & I. Somerville (Eds.), *Leading for Innovation and organizing for results* (pp. 95–104). San Francisco: Jossey-Bass.
- Prager, D. J. (2003). Organizing foundations for maximum impact: A guide to effective philanthropy. Washington, DC: The Aspen Institute.
- Schambra, W., & Shaffer, K. (2004). Grassroots rising: A conservative call for philanthropic renewal. *Nonprofit Quarterly*, 11(3). Retrieved September 11, 2007, from http://www.nonprofitquarterly.org/section/560.html
- Tushman, M. L., Anderson, P., & O'Reilly, C. (1998). Levers for organization renewal: Innovation streams, ambidextrous organizations and strategic change. In D. Hambrick, D. Nadler, & M. Tushman (Eds.), Navigating change: How CEOs, top teams and boards steer transformation (pp. 318–346). Boston: Harvard Business School Press.

INDEX

ADD 1.262	symbolic tactics, 1: 129
ABB, 1: 362 ABN Amro, 1: 103	targeted firms of, 1:128–129
Aboriginal isolation, 2: 253	Activity-based incentives, 2: 208
Aboriginal peoples, 2:253	Activity-based incentives, 2.208 Actors as Observers (Leifer), 1:390
Aboriginal peoples, 2:235 Absenteeism, 2:104	· · · · · · · · · · · · · · · · · · ·
Absolute poverty, 1:96, 97	Adams, John, 1:86–88
* *	Adaptability and adaptation
Absorptive capacity, 1:338	cultural, 2: 255, 327
and artistic methods, 1:492	intercultural, 2:253–255
and organizational structures, 1: 476	to organizational culture, 2:2 55
relative, 1:329–330	and organizational structures, 1: 472, 477, 478
Abundant environments, 1:19	Adbuster, 1:135
Academy of International Business, 1:201	Addiction, workaholism as, 1: 149–151
Academy of Management, 1:201	Additive tasks, 2:25
Accenture, 1:358, 2:446	"Add-on" programs, 2: 116
Acceptable quality levels (AQLs), 1:466	Adhocratic organizational form, 1: 487
Access control, 1:500, 504, 505	Adidas
Accidents, and artistic methods, 1:492, 495–497	culture-sensitive global strategy of, 1: 384
Accommodations for disabled employees, 2:108	and mass customization, 1:425
Accommodators, and dual-earner couples, 2: 77	Adler, N. J., 2: 37
Accounting, sustainability in, 1:258	Adler, Nancy, 2: 324, 326, 331
ACE alliance, 1:342	Administrative work, 2: 402
Acer, 1:235	Adobe Acrobat, and organizational memory, 2: 469
Achievement motivation, 2: 273	Adoption assistance, 2:177
Ackoff, Russel, 1:377	Adult development, and work motivation, 2: 162–166
Acquisitions, and culture-sensitive global strategy, 1:383	Advanced production scheduling (APS), 1:433
Acrobats, and dual-earner couples, 2:77	Advancement, stage of, 2:124
Action regulation, 2:207–208	Advance shipping notice (ASN), 1: 412
Action research, 2:4 39	Adversaries, and dual-earner couples, 2:77
Activating, as leadership activity, 2: 297–298	Adversity, struggling with, 1: 61–62
Activist group tactics, to influence companies,	Advertising agencies, 1:483
1: 127–135	Affect, 2: 260
and alternate business systems, 1:132–133	Affective conflict, 2: 146
classification of, 1:129–130	Affective Events Theory (AET), 2:261–262
and corporate governance, 1:130–131	Affective Infusion Model (AIM), 2:262
definitions of, 1: 128	Affective states, 2: 260
efficacy of, 1: 133–134	Affectivity, and Web use monitoring, 2:375
marketplace tactics, 1:131	Affirmative action, 2: 141, 142, 148
material tactics, 1:129	Affymetrix, 1: 39
and operational costs/benefits, 1:131–132	Afghanistan, and terrorism, 1:113
past vs. present, 1: 134–135	AFL-CIO, 1: 168, 169, 172
public opinion tactics, 1:131–132	Africa
shareholder tactics, 1:130–131	and ethical manufacturing, 1:462
and social alliances, 1:132	and globalization, 1:197

After-sale service, 1: 412, 2: 415, 416	American City & County, 2:104
Agars, Mark, 2: 143	American Hospital Association, 2:495
Age and aging. See also Older workers	American Management Association (AMA), 2:224, 373
cognitive, 2: 132–133	American National Standards Institute, and network
as grouping variable, 2:164–166	markets, 1:305
and intrinsic motivation, 2:197–198	American Production and Inventory Control Society
and mid- and late careers, 2:132–133	(APICS), 1: 411
physical, 2: 132	American Society for Training and Development, 2:441
stereotyping by, 2:164–166	Americans with Disabilities Act (ADA), 2:60, 61,
and work motivation. See Work motivation, and	108, 365
aging	Amit, R., 1: 328
Age bias, 2: 164–166	Amnesty International, 1:462
Age Discrimination in Employment Act (ADEA), 2:60,	Analysis, and career self-management strategies, 2:114
61, 164–165	Analysis mode, 1:300
Age-graded career stages, 2:131	Analytical hierarchy process (AHP), 1:285
Agency theory, 1: 348–349, 2: 371	Ancona, D. G., 2:39
The Age of Heretics (Kleiner), 2:426	Andersen, P., 1: 307, 2: 514
Agglomeration, 1:404–405	Anderson, Arthur, 1:108
Aggression, as organizational misbehavior, 2:224	Ang, S., 2: 307
Aging workforces, 2:104	Angell, L., 2:45, 51
Agranoff, R., 2: 295, 297	Anheier, H. K., 2:510
Ahmadjian, C. L., 2: 67	Answer Garden project, 2: 463
Airline luggage and customer tracking, 2: 420	Anthrax, 2:494, 498
Air traffic control, 2: 132, 163, 473	Anthropology, 2: 250–251
Air travel, commercial, 1:37	Anticipation inventory, 1:411
Alacina, A. 2:05	Antitrust policies, 1:391
Alexander Dear 1:112	Apparel industry, and mass customization, 1: 426, 427
Alger Heartin 1:113	Apple, 1:37
Alignment and graphizational atmostyres 1:478	Applegate, L. M., 2: 67
Allen N. J. 2:114	Apple TV, 1:306
Allen, N. J., 2:114	Appraisal systems, 2:117
Allen, Nathalie, 2:186	Approach-approach conflicts, 2: 205 Approach-avoidance conflicts, 2: 205
Allen, Richard, 2: 143 Allen, Robert, 2: 212	Appropriability, 1:337
Alliances, 1:324. See also Interconnected firms	Appropriated relational rent, 1: 329–330
building, as political tactic, 2: 214	Arabic, as Internet language, 2:392
cultural considerations with international, 1:382–383	Arbeitssucht, 1:152
development. See Development alliances	Architects, and office design, 1:457, 458, 459
and politics, 2:214	Argote, L., 2: 39
Allies, and dual-earner couples, 2: 77	Argyres, N. S., 1:342
Allison, G. T., 2: 475	Argyris, Chris, 2: 196, 425, 428, 446
Alpaslan, Murat, 1: 106, 108, 114	Ariba, and supply-chain management, 1: 416
Alter, C., 2: 293	Arora, A., 1: 181
Alter, Kim, 1: 27	ARPANET, 1:485
Alternate business systems, 1: 132–133	Arthur, M. B., 2: 114, 115, 118, 123
Alternative dispute resolution (ADR), 2: 59	Arthur, W. B., 1: 304
Alvarez, F. P., 2:108	Arthur D. Little, 1: 271
Amatea, Ellen S., 2: 81	Artistic methods, 1:490–498
Amazon.com, 1: 409, 414, 2: 18	and accident, 1:495–497
Ambidexterity, 1: 20, 472–473, 478	and ambiguity, 1:496
Ambidextrous management, 1:17–18	and business as making, 1: 493–494
Ambidextrous organizations, 1:478	closure in, 1: 497
Ambiguity	and "collections," 1: 497
and artistic methods, 1: 496	and control through release, 1: 495–496
and political behavior, 2: 217	and customer relationships, 1:497–498
resolving, 2: 243–244	emergence of, 1: 490–491, 494–495
American Association of Retired Persons (AARP),	and external variation, 1: 495
2: 133, 136	and failure, 1:495
·	,

form vs. content in, 1:497	Attacks
interdependency in, 1:494	identifying possible methods/tools/techniques of,
iterative process of, 1:494–495	1:506–507
as models for business practice, 1: 492–493	and organizational security, 1: 508
preparation focus of, 1:496	Attitudes 2:106
problems vs. difficulties in, 1:496	of employees, 2:196
process vs. outcomes in, 1:497	and intrinsic motivation, 2:196
randomness/disorder/chaos in, 1: 491–492	and organizational misbehavior, 2: 223
and serendipity, 1:496–497	Attitude survey techniques, 2: 438–439
Arts management, 2:482–490	Auburn University, 1:37
defined, 2: 482	Audio-technology telephone monitoring, 2: 371
governance structures in, 2:486–487	Auld, C., 2: 506
leadership in, 2:485–486	Australia, 2:96
marketing in, 2:488	and culture, 1:380
and size of arts organizations, 2:483–484	and development, 1: 191
and stakeholders in organizations, 2: 484–485	diversity in, 2:148
standard management practices in, 2:483	and entrepreneurship, 1:46
strategic decision making in, 2:487–488	and high technology entrepreneurship, 1:32
and volunteers, 2: 488–489	individualism in, 1: 224
Ascetic, 1:151	outsourcing by federal government of, 1:449
Ashforth, Robert, 2:184	sports organizations in, 2:503
Asia, 1: 230–238	and women entrepreneurs, 1:53
advantages found in, 1:230–231	and World Trade Center attacks, 1:202
brand-building focus in, 1:234–236	Australian Sports Commission (ASC), 2:503
breakdown of segregated markets in, 1:233	Austria
and ChinaIndia factor, 1:232	and development, 1:191
competitive environment shifts in, 1:231–234	masculine/feminine roles in society, 1:224
consolidation in, 1:236–237	power distance in, 1:224
cross-border synergies in, 1:236–237	Authenticity, need for, 2:126
innovation in, 1: 237–238	Authority, in creative foundations, 2:515
and labor relations, 1:169	Autocratic leadership, 1:160
"me-too" strategies' decay, 1:233–234	Automation, 2:113
as new competitive game, 1:238	Automotive industry, and mass customization, 1:426
and population growth, 1:191–192	Autonomous learning, 1:64
productivity drive in, 1:234	Autonomous Working Teams, 2:440
service-quality focus in, 1:234–236	Autonomy, 2:385
and speculators' demise, 1:231–232	as career anchor, 2:127
Asian Financial Crisis, 1: 209, 212, 216, 217, 230, 232	crisis of, 1: 109
Asia-Pacific Economic Cooperation (APEC), 1:444	and culture, 1:379
Asia-Pacific region, diversity of, 1: 213–214	Availability, 1:501
Aspen Institute, 1: 29	Avoidance-avoidance conflicts, 2:205
Assassi, I., 2: 487	Awareness, and creativity, 2:452
Assertiveness	Awareness of self and environment, 2:113
and culture, 1: 380, 382	Axelrod, A., 1:390, 396
and women management, 1:159	Ayman, R., 2: 307
Assessment center, 2:117	Ayman-Nolley, S., 2: 307
Assets identification, in organizational security, 1:506	Ayoko, O. B., 2: 47, 48
Asset specificity, 1: 337	•
Association of South-East Asian Nations (ASEAN), 1:230	"Ba," 2: 355
Asthma, 2: 103	Babcock, L., 1:159
AstraZeneca, 1:362	Babel Fish, 2: 396
Asymmetry, and business imitation, 1: 403	Baby boomers, 2: 136, 162, 198
ATA Software, 2:396	Bacharach, Samuel, 2:212
Atkinson, J., 2: 94	Back-office operations, outsourcing of, 1: 446
Atomic bomb development, 1: 484	Bagozzi, R. P., 1:181
AT&T	Balance, need for, 2: 126
loss of intellectual capital by, 2: 403	Balanced Scorecard, 1: 78, 2: 409
and supply-chain management, 1: 414	Balkans, and development, 1:191
and suppry chain management, 1.717	Darkans, and development, 1.171

Balser, D. B., 1: 129	and high technology entrepreneurship, 1:32
Baltes, Boris B., 2:82	uncertainty avoidance in, 1:224
Baltics, and development, 1:191	and women entrepreneurs, 1:53
Bandura, Albert, 2: 76, 205	Bench-marking, and young SMEs, 1:78
Bang & Olufsen, 1:498	Bendersky, C., 2:52
Bank of America, 1: 107, 2: 2	Benedict, Ruth, 2:256
Banks, and business imitation, 1: 402	Benefits, 2:114
Banyan Tree, 1: 234, 235	cafeteria approach to, 2: 136
Barcodes, 1: 438, 2: 412	and culture, 1:379
Bargaining power, and interconnected firms, 1: 330	at family-friendly organizations, 2:175–177
Bargaining process	and labor relations, 1:171
interest-based, 1:174	Benefits administration, BPO of, 1:444
and labor relations, 1: 174	Benefits of Equality, 1:163–164
Barilla, and supply-chain management, 1: 412	Benign neglect, 2: 142
Barkema, Harry, 1: 379	Ben & Jerry's, 1: 463
Barker, J. R., 2: 41	Bennett, W. L., 1: 132, 134
Barley, S., 2: 99	Bennis, Warren G., 1:60
Barnes & Noble, 1: 401	Berananke, Ben, 1:171
Barney, J., 1: 327, 328, 2: 36, 114	Berg, D. N., 2: 297
Baron, David, 1: 127, 128	Berkhout, E. E., 2: 98
Barriers, to mid/late career development, 2: 137	Berle, A. A., 1: 348
Bartholomew, Susan, 2: 324, 326, 331	Berman, S., 1: 128
Bartlett, C. A., 1:180, 181, 2:35–36	Bermeulen, Freek, 1: 379
Bartlett, Christopher, 1: 378	Besen, S., 1:306–307
Bartok, Bela, 1: 493	Best, M., 2: 66
Baruch, Y., 1: 194, 2: 118, 124, 125, 127	Best Available Control Technologies (BACT), 1:273
Baseball, professional, 2: 445	Best practices
Basic needs, 2: 216	for creative foundations, 2:5 13
Baskins, Ann, 2: 387	defined, 1: 210–212
Batt, R., 2: 67	in family-friendly organizations, 2: 178–179
'Battle of Seattle," 1:135	global transference of, 1:212
Baumeister, R. F., 2: 236	of new economy, 2:65
Bayh-Dole Act of 1980, 1: 36–37	Beta, VHS vs., 1: 305
BCG, 2: 446	Beutell, Nicholas J., 2:79
Beamish, P. W., 1: 330	"Beyond compliance," 1:267–268
Becker, B. E., 2: 87	Bhatacharya, C. B., 1:117
Becker, Gary, 1: 262–263	Bhopal disaster, 2: 493
Beckhard, Richard, 2: 446	Bias
Beechler, S., 1: 182–185, 188	age, 2: 164–166
Beehr, T. A., 2: 135	sinister attribution error, 2: 236
Beethoven, Ludwig von, 1: 492	Bigley, G., 2: 478
Begley, T. M., 1: 181	Bilateral competition, 1: 332
Behavior. See also Organizational misbehavior	Bilateral co-opetition, 1: 392, 393
as cause of catastrophic failures, 2: 473–476	Bill of Rights (U.S.), 1: 140
of employees, 2:196–197	Biotechnology, 1:487
intercultural, 2:256	Biotechnology, 1:407 Biotechnology start-ups, 1:338
and intrinsic motivation, 2: 196–197	Bird, A., 1: 183, 184, 2: 114
of leadership, 2: 274–275	Bird, Gloria W., 2: 82
workaholic, 1:153	Black, J. S., 2: 117
Behavioral ambidexterity, 1: 478	"Black box" development, 1:340
Behavioral complexity, 2:329	Black Hawk helicopter incident (Iraq, 1994), 2: 473
Behavioral differentiation, 2: 329	Blackspot, 1:135
	•
Behavioral repertoire, 2: 329 Behavioral sciences, 2: 441	Blake, R. A., 2:46
	Blame game, 2:475
Behavior control 2:228	Blazquez-Lidoy, J., 1:197
Behavior control, 2:228	Blinder, Alan S., 1:170
Belgium, 2:95	Blocking technology, 2:373
and development, 1:191	Blood Diamond (film), 1:462

D1. C.11 MC.11 1.104	D I C 2.516
Blowfield, Michael, 1:124	Brown, J. S., 2:516
Blue-collar work, 1:453	Brown, Jerry, 2: 387, 389
Blue Cross of Pennsylvania, 1:360	Brundtland Report, 1:465
Body language, 2:255	Buck, G., 2: 497
The Body Shop, 1:462	Budd, J. W., 2: 57
Boeing, 1: 383, 2: 409	Budgeting game, 2:214
Boin, Arjen, 1: 112, 113	"Building the firm," 1: 40
Bok, Derek, 1: 92	"Built-in obsolescence," 1:467
Boltanski, L., 2: 96	Bulgaria, and women entrepreneurs, 1:53
Bolwijn, P. T., 2: 93	Bullpen areas, 1:454
"Boomerang effect," 1:135	Bullwhip effect, 1:408–409, 411–412
Boroff, K. E., 2:60	Bullying, 2: 224
Boston Consulting Group, 1:78	Bunching of entry (into market), 1:399
Bottom-of-pyramid (BOP) approach, 1:99–100	Bunderson, J. S., 2: 38
Bottom-up design, of office space, 1:453	"Bureaucratic paradigm," 1:484, 486
Boundary(-ies)	Bureaucrats, and entrepreneurship, 1:45–46
cultural, 2: 28–29	Burke, E. M., 1: 148
functional differences, 2: 26	Burke, R. J., 1: 152, 154
geographic, 2: 27	Burma, and poverty, 1: 97
global, 2: 29	Burton, C., 2: 484
of global teams, 2: 26–29	Bush, George W., 1:22, 89
mechanistic coordination, 2: 29–30	Business
organizational borders, 2: 27	and environmentalism, 1: 271–272
for organizational emergence, 1: 3	as making "stuff," 1:493–494
social identity, 2: 26–27	Business case
temporal, 2: 27–28	for business process outsourcing, 1:447–448
Boundaryless careers, 2: 115, 118, 122–123	for organizational security, 1:501–502
Boundary role theory, 2: 330	for outsourcing, 1:447–448
Bounded rationality view, 1:296	Business ethics, in manufacturing, 1:463
Bouquet, C. A., 1:182, 184	Business imitation, 1:399–406
Bourque, L., 2:494	criteria for distinguishing theories of, 1:403
Bowen, Howard R., 1: 116	economic theories of, 1:400–401
Bowling, N. A., 2:135	and homogeneous strategies, 1:402–403
Bowling Alone (Putnam), 1:85	and identical response to common environmental
Boyacigiller, N., 1:182–185, 188	shock, 1: 404
Boyd, D. P., 1: 181	information-based theories of, 1: 400–402
BP, 1:102, 256	organizational theories of, 1:401–402
Bradshaw, P., 2:486	performance implications of, 1:404–405
"Brain drains," 2: 117	and resource similarity/complexity, 1:404
Brand building, in Asia, 1:234–236	and risk minimization, 1:403
Brandenburger, A. M., 1:389, 390, 394	rivalry-based theories of, 1:402–403
Brazil	Business office, 2:355
perceived fairness in, 1:226	Business planning, 1:364–374
and workaholism, 1:152	case-study contextualization of, 1:366, 368
Breashears, D., 2: 476	future research, directions for, 1:374
Bresman, H., 2:39	holistic tools in, 1:368
Bridge employment, 2: 134, 135, 137	literature on, 1: 365–367
Bridge retirement, 2:167	methods of, 1:365–368
Britain	Strategy Wheel tool for, 1:368–373
Asian colonization/occupation by, 1:214	theory of, 1: 365
and globalization, 1:190	tool development for, 1:368–373
British Airways, 1:456	Business plans, in young SMEs, 1:76
British colonial system, 1:380	Business process management (BPM), 1:437
British Petroleum, 1:356	Business process outsourcing (BPO), 1:443–449
Bromley-by-Bow, 1:457	of back-office functions, 1: 446
Bronte, L., 2: 135	benefits of, 1:446
Brotheridge, C. M., 2:116	business case for, 1:447–448
Brown, D., 2: 112, 118	business-value assessment of, 1: 447

and changing organizational structures, 1:445	nearshore outsourcing to, 1:446
comparative advantages of, 1:444–445	and September 11, 2001, terrorist attacks, 1:204
competition/customer drivers of, 1:445	sports organizations in, 2:503
core competency focus of, 1:445	telecommuters in, 2:175
decision making regarding, 1:449	and women entrepreneurs, 1:53
defined, 1: 444	Canada & North America Life, 2:107
drivers of, 1: 444–445	Cantillon, Richard, 1:23
of finance, 1: 446	Cantor Fitzgerald, 1:202
financial assessment of, 1: 447	Capability(-ies)
future directions of, 1: 449	development of, 2: 459
globalization driver of, 1: 444	organizational, 1:5
and global talent pool, 1:445	strategic, 1: 184–185
of human resources function, 1: 446	of work teams, 2:3
of IT, 1: 446	CapGemini, 1:358
of knowledge process outsourcing, 1: 446	Capital Capital
management of, 1:447–449	access to, 1:56
needs assessment for, 1:448	defined, 2: 401
negotiation/contract management in, 1:448	human, 2:218
operational assessment of, 1: 447	intangible. See Intangible capital
of operations/logistics, 1: 446	organizational, 2:218
project/relationship management in, 1:448–449	process, 2: 402, 403
and public sector reforms, 1:445	social, 2: 218
risk assessment of, 1:447–448	types of, 1: 466
risks with, 1: 446–447	for women entrepreneurs, 1:56
and technology trends, 1:445	Capitalism, 1:151
types of, 1: 445–446	Carbon dioxide emissions, 1: 466
vendor assessment for, 1:448	Cardiovascular disease, 2:103
Business process outsourcing management issues,	Career(s), 2:110, 120–128
1: 443–449	anchors for, 2:127
Business process reengineering (BPR), 1:436–437, 444	boundaryless, 2:122–123
Business systems, alternative, 1:132–133	context of, 2: 111–112
Business-to-business (B2B) e-commerce, 1:313	decision making for, 2:112–114
Business unionism, 1:168	and employability, 2:126
Business-value assessment, 1:447	and "fit," 2: 112–114
Bussell, H., 2:488, 489	global, 2: 128
	history of, 2: 120
Cafeteria plans, 2:91	and individuals, implications for, 2:128
Calculator industry, 1:405	intelligent, 2: 123
Caldwell, D. F., 2: 39	and involuntary changes, 2: 137
California, 2: 386, 387, 389	kaleidoscope career model, 2: 126–127
Caligiuri, P., 1: 182	and language, 1: 243–244
Callanan, G. A., 2: 118, 125	and matching needs, 2: 121
Call centers, 1: 445, 448, 2: 371	methods, 2: 127–128
Campaign GM, 1:130	mid- and late. See Mid- and late careers
Campbell model of creative process, 1:491–492	multidirectional, 2: 125–126
Campbell Soup, 1:408	and organizations, implications for, 2: 128
÷ •	<u>.</u>
Campus mobility, 2: 352	as personal development, 2:113
Canada	postcorporate, 2:124
and activist group tactics, 1:132	and proactivity, 2:126
and culture, 1:380	protean, 2: 123–124
and development, 1:191	and psychological contracts, 2: 122
and entrepreneurship, 1:46	and resilience, 2: 125
environmental compliance in, 1:267	as resource, 2:114
and global business citizenship, 1:144	stages models, 2: 124–125
individualism in, 1:224	strategies for, 2:125
and labor relations, 1:173	studying, 2: 127–128
and Manhattan Project, 1:484	and success, 2: 121–122

theories on, 2: 120–127, 131	Case Western Reserve University, 2:446
and value-based holistic model of, 2:137	Casey, C., 2: 98
Career anchors, 2:127	Cash incentives, 2:106
Career capital, 2:114	Casio, 1: 405
Career congruence, 2: 131	Caste, 2: 255
Career development movement, 2:112	Castro, Fidel, 1:111
Career entry stage, 2:124	Casualty collection points (CCP), 2:497
Career Information Processing (CIP) model, 2:112, 113	"CASVE" (communication, analysis, synthesis, valuing,
Careerist, 2:111	execution), 2:113
Career management, 2:110–118	Catalano, M., 2: 113
applications of, 2:111–117	Catalyst 400, 1: 456–457
and career self-management (CSM), 2:112-114	Catastrophic organizational failures, 2:471–478
and coaching, 2:117	behavioral perspectives on, 2:473–476
and context of careers, 2:111–112	future research directions for, 2:477–478
and development, 2:116, 117	high-reliability organizations vs., 2:476–477
and "fit," 2: 112–114	structural perspective on, 2:472–473
individual, 2:111	Caterpillar, 1: 170, 412, 2: 107
international, 2:117	Caution, as intercultural guideline, 2:257
and mentorship, 2:117	Cellar, Douglas, 2:145
organizational, 2:111, 114–117	Cellular design, 1:454
and orientation, 2:116	Census data, U.S., 1: 6–7
and performance evaluations, 2:116–117	Center for Advanced Vehicle Electronics, 1:37
and personal development, 2:113	Center for Creative Leadership, 2:328
and selection, 2:116	Center for Disease Control and Prevention (CDC), 2:492
and staffing policies, 2:115–116	495, 497
theories of, 2: 111–117	Center for Research on Information Technology and Or-
and training, 2:116	ganizations (CRITO), 1:37
Career mobility, 2:134	Center for the Advancement of Social Entrepreneurship,
Career planning	1: 26
and globalization, 1:186–187	Central Intelligence Agency (CIA), 2:382
and women management, 1:159	Central office, 2:355
Career proactivity, 2:126	CEO/CIO relationships, 1:318, 319
Career resilience, 2:121, 125	CEOs
Career self-management (CSM), 2:111–114, 112	and hubris theory, 1:349
decision making for, 2:112–113	and poverty, 1:96
and "fit," 2: 112–113	women, 1: 157
and personal development, 2:113	CE-performance link, 1: 18–19
strategies of, 2: 113–114	CERES, 1:130
Career stability, 2:134	Cerpa, N., 1: 316
Career stages models, 2:124–125	Certo, S. T., 1:182
Career success, 2: 121–122	CFCs, 1:469
"Career system," 2:115	Chakrawarthy, Balajai, 1:380
Care-givers, 2:133	Challenge
Carli, L. L., 1: 162	as creativity/innovation dimension, 2:457
Car manufacturing, 1:382–383	need for, 2: 126
Carmin, J., 1: 129	Challengers, in network markets, 1:307–311
Carpenter, M. A., 1: 182	Challenger space shuttle accident, 2:473–475, 475
Carr, R., 2: 488	Chameleon corporations, 1:381
Carroll, Archie B., 1: 99, 116	Chandler, A., 1: 202
Carson, E., 2: 514	Chandler, Alfred, 1:377
Carson, Rachel, 1: 272, 461	Chang, Won-kie, 1:387
Cartels, 1:391, 2:504	Change agency, 2:424–434
Carter, C. R., 1:124	and consultants, 2:431
Carter, Craig R., 1:120, 122, 123	history of, 2: 426
Carter, J. R., 1:124	and intellectuals, 2:431–432
Carter, S., 1:51, 56	and mentors, 2: 432–433
Cascio, W. F., 2:66, 118	and nature of organizational change, 2:424-426

and organizational leaders, 2:429	perceived fairness in, 1:227
and organizational managers, 2:4 30	performance-based rewards in, 1: 217
and organizational members, 2: 433	and poverty, 1: 96
role possibilities in, 2: 428–429	R&D spending in, 1: 231
success/failure of change initiatives, 2: 433–434	shift to market socialism in, 1: 212
and teachers, 2:432	state-owned enterprise practices in, 1:212, 218
and teams, 2: 430–431	and supply-chain management, 1:416–417
and types of organizational change and agency,	in WTO, 1: 217
2: 427–428	China–India factor, 1:232
Change agents, for environmentalism, 1:278–279	Chinese, as Internet language, 2:392
Change management	Choe, J. M., 1:316
and emotion, 2:265	Choice process, strategic, 1:298–300
for environmental issues, 1: 276–279, 278–279	Choice team task, 2:25
Change-to-Win Coalition, 1:169, 172	Chrislip, D. D., 2: 296
Channel restructuring, 1: 411–412	The Chrysanthemum and the Sword (Benedict), 2:256
Channel Tunnel, 1: 484–485	Chrysler Corporation, 1:170, 383
CHAOS (Create Havoc Around Our System), 1:174	Chudoba, C., 2: 38
Chaos, and artistic methods, 1:491–492	Ciao.com, 2: 18
Charisma, 2: 276	Circuit City v. Adams (2001), 2: 61
Charismatic leadership style, 2: 273, 486	Circus Space, 1:457
Charitable contributions to community, 1:382	CIS, and development, 1:191
Charitable foundations, 2: 510	Cisco Inc.
Charity, philanthropy vs., 2: 512–511	and organizational security, 1:505
Chemical Manufacturers Association Responsible Car	and supply-chain management, 1:409
initiative, 1:277	Citibank, 1:108
Chevy Automobile Co., 1: 170	Citicorp, 1:381
Chevron, 2: 2, 4, 107	Cities, and globalization, 2:252
Chevron-Texaco, ERP at, 2:343	Citigroup, 1:102
Chiapello, E., 2: 96	Citizenship
Chiat Day, 1: 456	communitarian, 1:142–143
Childbearing, 2: 113	comparative views of, 1: 143
Child care, 1: 55, 2: 175–176	global business. See Global business citizenship
Child rearing, 2: 113	minimalist, 1: 141–142
China, 2: 252–253. <i>See also</i> Taiwan	nature of, 1: 140
and activist groups, 1:134	states of, 1: 140–141
and artistic methods, 1: 491	universal principles approach, 1:143
and China-India factor, 1:232	"Citizens of the world," 2:117
in competitive environment, 1: 232	City of Mesa, Arizona, 2:107
consumerism in, 1:233	Civic responsibility. See Social and civic responsibility
cost innovation in, 1:237–238	Civilizations, 1:379
demographics, 1: 213	Civil Rights Act of 1964, 2: 60, 61, 141
economic growth in, 1: 230, 231, 252	Civil rights movement, 2:141
and entrepreneurship, 1:48	Civil society groups, 1:128
ERP in, 2: 343	Clair, Judith, 1:109
and ethical manufacturing, 1:461, 462, 468	Claman, P. H., 2: 114, 123
and globalization, 1:190, 191, 194, 197	Clark, K. D., 2: 39
higher education in, 1: 231	Clary, E. G., 2: 489
high technology entrepreneurship in, 1:32, 34, 38–39	Class, host culture of, 2:255
HRM practices in, 1: 213, 214, 215	Class action lawsuit, 2:61
immigrant entrepreneurs from, 2:150	Clausewitz, Karl von, 1:377
and labor relations, 1:170	Clean Air Act, 2:175
language issues in, 1:241	Climate, organizational, 2:384
lifetime employment in, 1:217	Climate change, 1:466
and management, 1:196	Climate for Innovation Questionnaire, 2:457
as manufacturing center, 1:230	Closed-loop manufacturing, 1:286
McDonald's in, 2:30	Closure, and artistic methods, 1:497
outsourcing to, 1: 356, 445	Clustering, 2:344

Coaching, 2: 117	Columbia space shuttle accident, 2:471, 474, 478
Coast Guard environmental monitoring, 1:265	Columbus, Christopher, 1: 484
Coca-Cola, 1: 378, 2: 392, 398	Colvin, A. J. S., 2:59, 61
and business imitation, 1:405	Comaraderie, and teleworking, 2:366
culture-sensitive global strategies of, 1:378	Combination, 2:337
Code of Federal Regulations (CFR), 2:492	Comfort, and mass customization, 1:423-424
Codesign, customer. See Customer codesign	Commercial entrepreneurship, social vs., 1:25-26
Codes of conduct	Commission of the European Communities, 1:117
and corporate social responsibility, 1:99, 118-119	Commitment, 2: 3, 126
and global business citizenship, 1:145	"Commitment to the organization," 2:114
and poverty, 1:99	Common understanding, 2:337
and poverty alleviation, 1:99	Communication, 2:276
Codified ethics, 1: 116	and career self-management strategies, 2:113
Coethnic communities, 2: 152	as culture division, 2:251
Cognitive accessibility, 2: 185	face-to-face interaction, 2:282–283
Cognitive aging, and mid- and late careers, 2:132–133	of global teams, 2:31
Cognitive complexity, 1: 182, 183, 185, 203	intercultural. See Intercultural communication
Cognitive constraints, and organizational structure, 1: 475	limited and protected, 2:385
Cognitive costs, and mass customization, 1:427	and mass customization, 1:423
Cognitive resource theory, 2: 274	and organizational security, 1:503
Cognitive structures, 1:179–180, 183	and remote leadership, 2:282–283
Cognitive style, and creativity, 2: 452	and telework, 2: 363–365
Cohesiveness	and women management, 1:159
organizational, 2:222	Communication media, for remote leadership, 2:284
and organizational misbehavior, 2:222	Communication revolution, 1: 485
of work teams, 2:3	Communications networks, 2:239–247
Colby, K. M., 2: 232, 235–236	advantage of, 2:245
Colgate-Palmolive, ERP at, 2: 343	defining, 2: 240
Collaboration	employee characteristics for, 2: 242–244
and artistic methods, 1:494, 495	fears in, 2: 246
and co-opetition, 1:391	framework for, 2: 239–242
Collaborative capital, 2: 405	and growth need interview, 2:244–245
in customer value development, 2: 403	language-based, 1:244
deficiencies in, 2:407	leadership sharing (LS), 2:241–242
payoffs of, 2: 408–409	recommendations for, 2:247
in successful product development, 2:406	research for, 2: 246, 247
Collaborative innovation, 2:14–22	strategies for, 2:245–246
customer involvement for, 2: 15–16	Communitarian citizenship, 1: 142–143
and customer knowledge, 2:15–16	Community, 1: 125, 2: 16
"knowledge import" vs., 2:17	Community of practice (CoP), 2:339
in virtual environments, 2: 16–17	Community Reinvestment Act, 1:107
and Web-based customer knowledge, 2:18–22	Community sport, 2:5 03
Collard, B. A., 2: 125	Commute time, 2: 362
"Collections," and artistic methods, 1:497	Companies without office spaces, 1:456–457
Collective bargaining, 2: 122	"Company speak," 1:243
Collectivism, 1: 195, 2: 110	Compaq Computer Corp., 2:383, 387
and fairness perceptions, 1:224	Compassion in leadership, 2: 276
and self-interest dilemma, 2:8	Compatibility, and network markets, 1:304–305
Collier, John, 2:439	Compensation
Collins, C. J., 2: 39	components of, 2:90–91
Collocation, and remote leadership, 2: 284–285	and culture, 1:379
Collusion	and pay level decision making, 2:90–91
and business imitation, 1:405	strategic management for, 2: 87
and co-opetition, 1:391	Compensation hypothesis, 2: 79
Colocated teams, 2:353	Compensatory tasks, 2:25
Cologne Institute for Business Research, 2:96	Competence, in current job, 2: 125
Colombia, collectivism in, 1:224	Competence Visualizer, 2: 344

Competency trap, 1:404	destructive processes of, 2: 46–50
Competition	and dispute management, 2:50–53
among sport organizations, 2:504–505	and diversity, 2:45–46
in Asia, 1: 238	dynamics of, 2: 46–50
bilateral, 1:332	and geographical arrangements, 2:46
and business process outsourcing, 1:445	nature of, 2: 44–46
and co-opetition, 1:392–393	and outcomes of conflicts, 2:50–53
and death rates of new firms, 1:34	patterns of, 2: 48–50
in network markets, 1:306–307	Conflicts
and organizational politics, 2: 218–219	as creativity/innovation dimension, 2: 457
and pay level. See Pay level decision making	and human resources management, 2: 60–61
Competitive advantage	of interest, 1:463
organizational security as, 1:508	and labor relations, 1:175
with RFIDS, 1:438	in work teams, 2:5 0–53
'Competitive advantage of nations," 1: 377	Confusion, as intercultural error, 2: 250
Competitive aggressiveness, 1: 17	Congruence model, 2:80
Competitive aggressiveness, 1.17	"Congruent choices," 2:112
in Asia, 1: 231–234	Conjunctive tasks, 2: 25
	ConocoPhillips, 2:8
and corporate entrepreneurship, 1: 11–12	1
Competitive operating agreements, 1:174	Conrad, P., 2:103, 104, 108
Competitive pressure, 1: 316, 318	Conservation of resources theory (COR), 2:80
Complementary resources	Consolidation, in Asia, 1:236–237
and business imitation, 1:404–405	Consortium child care, 2: 176
and co-opetition, 1:394	Conspiracy, exaggerated perception of, 2:236
Complexity	Constitution of the Commonwealth of Massachusetts,
and business imitation, 1:404	1:86–87
and mass customization, 1:426	Constraints on strategy of an organizational structure,
Complexity theory, 1:203	1:472–479
Compliance, with environmental regulations,	Constructionist discourses, 2: 426
1:261–269	Consultants, as change agents, 2:431
defining, 1: 261–262	Consumer behavior, sports, 2: 502–503
economic theories of, 1:262–264	Consumer goods retailers, RFID use by, 2:419
empirical evidence of, 1:265–267	Consumerism, 1: 131, 233–234
employee monitoring, 1:264–265	Content, form vs., 1:497
and ethical manufacturing, 1:464–465	Context, and organizational security, 1:503, 504
and management, 1: 268–269	Contextual ambidexterity, 1:478
and nongovernmental sanctions, 1:264	Contextual forces, 2:111
and penalties, 1: 262–264	Contextualist discourses, 2:426
and public policy, 1:268–269	Contextualization, 1:181
rationale for, 1:261	Continental Airlines, 1:360
trends in exceeding, 1:267–268	Contingency plans
Compounded annual growth rate (CAGR), 1:433	in organizational security, 1:508
Comprehensive total landed cost model, 1: 417	and outsourcing, 1:449
Compressed workweeks, 2:173–174	Continuity
Computer-based documents/databases, 2:340	as intercultural guideline, 2:258
Computer Security Institute (CSI), 1: 501, 2: 372	of work teams, 2:3
Conceptlabvolvo.com, 2:19	Contracting costs, with development alliances, 1:337
Conceptualization, 1:181	Contract management, 1:448
Concurrent engineering (CE), 1: 432, 2: 406, 407	Contractual agreements
Conference Board, 1:113, 139	and global business citizenship, 1:142
Confidence, of women entrepreneurs, 1:54	and interconnected firms, 1:330
Confidentiality, and organizational security, 1: 501	Contractual labor, "free-agent," 1:172
Configuration system, and mass customization, 1: 424	Control(s)
Conflict management, in work teams, 2:44–53	and artistic methods, 1: 495–496
antecedents of, 2: 44–46, 48–50	crisis of, 1: 109
approaches to, 2:46–48	in developing countries, 1: 195–196
constructive processes for 2:46–50	of information flow 1:454

and organizational misbehavior, 2:222	Corporate entrepreneurship (CE), 1:11–20
outsourcing and loss of, 1:446	and ambidextrous management, 1:17-18
personal Web use monitoring as tool for, 2:371–372	and competitive environment, 1:11–12
and strategic planning, 1:78	and entrepreneurial orientation, 1:16–17
and teleworking, 2:368	future research, directions for, 1:19-20
through release, 1:495–496	and the individual, 1:13–14
and young SMEs, 1:78	intentions of, 1:13
Convergence	managing, 1: 15–18
and business imitation, 1:399	and the organization, 1:14–15
and co-opetition, 1: 393–394	organizational problems with, 1:12
and developing countries, 1:197–198	performance link with, 1:18–19
Convergent thinking	shift from entrepreneurship to, 1:12
and artistic methods, 1: 492	and strategy, 1:15
and office design, 1:454	Corporate environmentalism. See also Environmentalism
Conway, N., 2: 111	early drivers of, 1: 272
Cool, K., 1:327	evolution of, 1: 274–275
Cooper, C., 2: 67	institutionalizing, 1:279
Cooper, Stephen, 1:108	legislation affecting, 1:272–274
Cooperation, 1:382	Corporate governance, and activist tactics, 1:129–130
Co-opetition, 1:3 86–397	Corporate gym, 2:104
analysis level in, 1:392	Corporate image, and women managers', 1:164
business relationship axis in, 1:391–392	Corporate social responsibility (CSR), 1:116–125,
and competition, 1:392–393	274–275
drivers of, 1: 394–395	and codes of conduct, 1:118–119
future research, directions for, 1:396–397	and community, 1:125
in high-technology industries, 1:393–394	and developing countries, 1:196
history/intellectual roots of, 1:389–391	environmental logistics, 1:121
number of actors in, 1:392	environmental purchasing, 1:124
organizing framework for, 1:391–393	environmental SCM, 1:119
outcomes of, 1: 395–396	and ethical manufacturing, 1:463–464
processes of, 1:395	ethics in, 1: 120, 123, 124
and product life cycles, 1:393	and formal management systems, 1:118–119
and R&D costs, 1: 394	and global business citizenship (GBC), 1:138–139
between Samsung and Sony, 1:387–389	and global management, 2:330–331
and technological convergence, 1:393–394	history of, 1: 116–117
Co-Opetition (A. M. Brandenburger & B. J. Nalebuff),	and logistics, 1: 119–121
1:389	and minority-/women-owned business enterprises,
Coordinated planning, forecasting, replenishment (CPFR),	1: 124–125
1: 412	and nonfinancial reports, 1:117–118
Coordination	and poverty, 1: 100–103
costs, 1: 337–338	in purchasing, 1: 121–124
and development alliances, 1:337–338	in small-/medium-sized enterprises, 1:125
in global teams. See Global teams, coordination in	in sourcing, 1:124
in network markets, 1:305–306	in supply chain management, 1:116–125
in supply-chain integration, 1: 436	in 20th century, 1: 138–139
Coors Brewing Company, 2:106	Corporate strategy review, 1: 417
Copyright infringement, 2:373	Corrective measures, for organizational misbehavior,
Core activities, and business process outsourcing, 1 :444	2: 228–229
Core competency(-ies), 1: 365	Corrosive politics, 2: 213, 216–218
BPO focus on, 1:445	Corruption, and entrepreneurship, 1:45, 47–48
leadership as, 1:383	COSE group, 1:342
in young SMEs, 1:77	Cosmopolitanism, 1:182, 183, 185
Core products and services, 2: 458–459	Cost innovation, 1:237–238
Core transformation process, organizational security in,	Costs
1:505–506	and health-care, 2:103
Cornelissen, W. J. M., 2:94	and mass customization, 1:425-426
Corporate citizen, 1:141, 143	of mass customization, 1:426

and outsourcing, 1:446, 447	Cross-cultural justice research, 1:225–226
R&D, 1: 310	Cross-cultural training, 1:186
switching, 1:310	Cross-cultural values, 2:327–28
Council of Logistics Management, 1:120	Crystallized intellectual abilities, 2:162
Council of Supply Chain Management Professionals,	Csikszentmihalyi, M., 2:208, 452, 453
1: 120	CSN, 1: 190
Counterinsurgency, 2:213	Cuba, and organizational crisis management, 1:111
Cowen, Scott, 1:108	Cues, nonverbal, 2:283
Cox, Taylor, 2: 141–143	Cuisine, host culture of, 2: 255
Cradle-to-cradle concept, 1:467–468	Cultural adaptability, 2: 327
Cradle-to-grave concept, 1:467	Cultural change, 2:251–252
Craft model of organization, 1: 425, 426, 485, 486	linguistic, 2:251
Craftsmanship, 1:421	and office design, 1:458
Cramton, C. D., 2: 40	and technology, 2:251–253
Cray, D., 2: 488	Cultural diversity
Create Havoc Around Our System (CHAOS), 1:174	and global projects, 1:487
Creative destruction, 1:139	and multilingual e-commerce Web sites, 2:394
Creative Education Foundation, 2:453	Cultural immersion exercises, 2:145
Creative foundations. See Philanthropic organization	Cultural imperative, 1: 378
management	Cultural intelligence, 1: 184, 2: 8, 328
Creative intelligence, 1:63–64	Culturally endorsed leadership theory (CLT), 2:303
Creative philanthropy, 2: 511	Cultural perspectives, 1:180
Creative potential, of women managers, 1:164	Cultural predisposition, 1:380–381
Creative Problem-Solving (CPS) Model, 2:453–454	Cultural quotient, 2:328
Creative thinking, 2: 452	Cultural relativism, 1:381
Creativity, 2:450–460	Cultural sensitivity, 1:381–384
assessment of, 2: 454–455	Cultural strategy(-ies), 1:376–384
as career anchor, 2:127	with alliances/mergers, 1:382–383
climate for, 2: 457–458	and cross-cultural comparisons, 1:378–380
and creative process in organizations, 2:453–454	ethical dimension of, 1:384
in decision process, 1: 299	global dimension of, 1:377–378
defined, 2: 450–451	and leadership, 1:383
designing to stimulate, 1:454	in multinational firms, 1:380–384
and emotion, 2:263	orientations of, 1: 380–381
future directions for managing, 2:459	sensitivity in, 1: 381–384
group, 2: 452	Cultural values, and HRM best practices, 1:212, 214
individual, 2: 451–452	Culture(s), 2:110. See also Intercultural communica
and innovation, 2:450–460. See also Innovation	tion; Organizational culture(s)
management practices stimulating, 2:458	adaptation to, 2:255
of managers, 1:496	and Allied invasion of France/Germany, 1:484
and office design, 1:453, 455	anthropological concept of, 2: 250–251
systems approach to, 2:452–453	and cities, 2: 252
Crenson, Matt, 1:113	and communication, 2:250–251
Crisis management	and cultural change, 2:251–252
mental action plan for, 1:112	defined, 1: 379
organizational. See Organizational crisis manage-	divisions of, 2: 251
ment	and emotion, 2: 266–267
"Crisis of autonomy," 1:109	four-dimensional model of national, 1:379
"Crisis of control," 1: 109	and global management, 2:325
"Crisis of leadership," 1:109	and global mind-set, 1:180
"Crisis of red tape," 1:109	and global teams, 2:28–29
Crisp, C. B., 2: 38, 46	host, 2: 256
CRITO (Center for Research on Information Technology	and implicit leadership theories, 2:303, 305
and Organizations), 1:37	of indigenous peoples, 2: 253
Cropanzano, Russell, 2:260, 261	and leadership, 2:275–276
Cross-border synergies, in Asia, 1:236–237	"macho culture," 1:161
Cross-cultural aspects, of emotion, 2:266–267	manifestations of, 1: 379
Cross-cultural awareness, and outsourcing, 1:449	organizational. See Organizational culture

of peasant villages, 2: 252–253 and perceptions of fairness. <i>See</i> Fairness perceptions	Daimler-Benz, 1: 383 DaimlerChrysler Corporation, 1: 170, 362, 2: 104
of philanthropic foundations, 2:513	Dalton, D. R., 1:182
sports, 2: 506–508	Data mining, 1:369
and sustainability, 1: 255–256	David, P. A., 1: 304, 305
and transfer of HRM best practices, 1: 214	Davis, Keith, 1: 127
Culture jamming, 1:131–132	Davis, P. S., 1: 181
Culture of health, 2:106–107	Davison, S. C., 2: 37
Culture's Consequences (Hofstede), 2:327	Dawis, R. V., 2: 112
Culture-sensitive global strategies, 1:376–384	DDT, 1: 469
Culture shock, 2: 250, 327	Deakin, Elizabeth, 1:121
Cummings, J., 2: 38	Deal, D. W., 2: 471
Cummings, J. N., 2: 40	DealTime.com, 2:18
Cuskelly, G., 2:506	"Death march" syndrome, 1: 439
Customer(s). See also Mass customization	Death rates, of new firms, 1:34
and business process outsourcing, 1:445	De Bakker, F. G. A., 1:128, 129, 132
and collaborative innovation, 2:15–16	Debates, as creativity/innovation dimension, 2:457
mass customization codesign by, 1:424-425	Deceitful practices, 1:123
and office design, 1:457, 458	Decision making, 2:299
social knowledge of, 2:17	and catastrophic failures, 2:474–475
and women managers' success, 1:164	and emotion, 2: 263–264
Customer awareness, and ethical manufacturing, 1:468	global, 1: 183
Customer centricity, of mass customization, 1:421–422	and implicit leadership theories, 2:305–306
Customer codesign, and mass customization, 1:422,	strategic. See Strategic decision making
424–425	Decision-making theory, 1:297
Customer data, and organizational security, 1:501	Decision traps, 1:298
Customer equity, 1:422	Decline, stage of, 2:124
Customer knowledge, 2:15–16	Decontamination, 2:498
core, 2: 16	Decoupling inventory, 1:411
explicit, 2: 15	Dedication to a cause (service), 2:127
individual, 2: 15–16	De Dreu, C. K. W., 2: 44, 49, 51, 52–53
and mass customization, 1:428	Dedrick, J., 1: 310
peripheral, 2:16	DeFillippi, R. J., 2:114, 123
social, 2: 15–16, 17	Degussa, 1: 362
tacit, 2: 15	Delaney, J. T., 2: 60
Web-based, 2: 16–22	Delayed product differentiation, 1:426
Customer orientation, of mass customization, 1:421–422	Delayering, in new economy, 2: 69–71
Customer relations, in environmental supply chain man-	Delegating, leadership style, 2: 274
agement, 1: 287	Dell Computer Corporation, 1:33, 2:106, 403
Customer relationship management (CRM), 2:411	high technology entrepreneurship at, 1:33
and artistic methods, 1:497–498	mass customization by, 1:421
and EEA, 1: 433	open office at, 2:383
and outsourcing, 1:448	Deloite, 2: 446
Customer satisfaction, and mass customization, 1:427	Delta Airlines, 1: 174
Customer service, and supply-chain management,	Demand resource model, 2:80
1: 415, 416	Demand signal processing, 1:411
Cusumano, M. A., 1:304, 305	Demanufacturing, 1:286
Cyber crime, 2:226	Demeanor, of transnational teams, 2:37
Cyberloafing, 2: 370, 373	Demerouti, Evangelia, 2:78
Cycle inventory, 1: 411	Democratic leadership, 1:160
Czech Republic	Demographic changes, 1:170
and high technology entrepreneurship, 1:32	Den Hond, Frank, 1: 128, 129, 132, 135
and workaholism, 1:152	Denial, and workaholism, 1:149–150
Czinkota, M., 1:206	Denmark, 2:95
D I 'I W I 4405	and culture, 1:380
Daguerre, Louis Jacque Mande, 1:495	and development, 1:191
Dahan, E., 2: 15, 18, 20, 21	and entrepreneurship, 1: 42
Daily, C. M., 1: 182	environmental compliance in, 1: 267

and flexible accumulation, 1:205 masculine/feminine roles in society, 1:224	networks of, 1: 342–343 organizational issues with, 1: 341–342
power distance in, 1:224	problems/opportunities with, 1:342
uncertainty avoidance in, 1:225	scope of, 1: 339
and women entrepreneurs, 1:52, 53	selecting, 1: 336–338
Department of the Interior (DOI), 2: 373	and supplier involvement, 1:340
Dependent care, 2:175–176	and tangible costs/benefits, 1:336–337
child care, 2: 175–176	Development for sustainability, 1:465
elder care, 2:176	Development Gateway Foundation, 1:197
De Rond, M., 2: 293	Development phase, in decision process, 1:299
Design	Devine, D. J., 2: 3
and fitness for purpose, 1:457–458	Dewett, T., 1: 314
of organizational structures, 1: 474	Dharwadkar, R., 2: 241
process of, 1: 457	Dhillon, G., 2: 246
of "third spaces," 1:456	Dhondt, S., 2: 97
Design for disassembly (DFD), 1:414	Diabetes, 2:103
Design for manufacture and assembly (DFMA), 1:432	Diageo, 1: 238
Design for the environment (DFE), 1: 282, 285, 287, 289,	Diamonds, 1: 462
414, 467	Diana Project, 1:51, 53
Design theory, 1:486	Dickerson, A. P., 1: 346
Desimone, R. L., 2: 118	Dierickz, I., 1: 327
Desivilya, S. H., 2: 47, 49, 51	Differentiation, 1:183, 309
De Soto, Hernando	Difficulties, problems vs., 1:496
and entrepreneurship, 1:46, 47	Digital dashboards, 2:345
and poverty, 1:97	Direct network effects, 1:303, 341
Destructive technologies, 1: 139	Disaster mortuary response teams (DMORTs), 2:497
Determinative theories, 1: 306	Disasters, 1:110, 113, 201. See also specific types, e.g.
Deterministic models, 1: 413	Hurricane Katrina
Deutsch, M., 2:51, 232, 236	and crisis management, 1:110
Deutsch, Morton, 2:47	and organizational security, 1:507
Deutsche Bank, 1:102	Disaster syndrome, 2:493–494
Deutsche Post, 1:102	Discipline, in philanthropic foundations, 2:513
Deutsche Post World Net, 1:356–357	Discounts, 2:108
Developing countries, 1:190–198	Discovery to deployment path, 1:37–38
controls in, 1: 195–196	Discretionary tasks, 2:25
and convergence/divergence, 1:197–198	Discrimination, 2:108
and corporate social responsibility, 1:196	Disjunctive tasks, 2:25
definitions of, 1: 191	Disorder, and artistic methods, 1:491–492, 492
emerging power of, 1:196–197	Disorganization, and artistic methods, 1:491
and ethics, 1:196	Dispersalist discourses, 2:426
leadership in, 1:195	Dispersed entrepreneurship, 1:14–15
management in, 1: 194–196	Dispute management, in work teams, 2:50–53
organizing in, 1:195	Distance
planning in, 1:195	and global management, 2:325
population growth in, 1:191–192	and remote leadership, 2:282–285
staffing in, 1:195	and trust, 2: 287
statistics relating to, 1:192–194	Distinctiveness, perceived, 2:234
Developmental assignments, 2:116	Distributed collaboration, 2:353–354
Development alliances, 1:335–343	Distributed organizations, 1:506
characteristics of, 1:336	Distribution channel, 1:411
and contracting costs, 1:337	Distribution management
and coordination costs, 1:337–338	in environmental supply chain, 1:287–288
designing, 1: 338–340	sustainability in, 1:257
equity, 1: 339	Distributive justice, 1:223, 225–226
and flexibility benefits, 1: 338	Distrust, 2: 231–232
and learning benefits, 1:338	Divergence, and developing countries, 1:197–198
leveraging experience of, 1: 339–340	Divergent thinking, 1:492
multilateral, 1:340–342	Diversity, 2:124

of Asia-Pacific region, 1:213–214	Drucker, Peter, 1:23, 91, 420, 421, 490, 2:131
and conflict management, in work teams, 2:45-46	Dual-career couples, 2:77
as conflict trigger, in work teams, 2:45-46	Dual career path system, 2:116
design incorporating, 1:452–453	Dual Concern Model, 2:46–47
and entrepreneurship, 1:48, 65–66	Dual-earners, 2:76–77, 81, 133
global sales force and, 2:349	Dual-job couples, 2: 77
initiatives for, in organizations, 2:147	"Dual theory," of human resources management, 2:58
of language, 1:242–243	Ducati.com, 2:19
openness to, 2:327	Duguid, P., 2: 516
research difficulties for, 2:144	Dulac, N., 2: 473
of transnational teams, 2: 37	Dumpster diving, and organizational security, 1:508
types of, 2: 146	Dun and Bradstreet, 1:6, 7
Diversity management, 2:140–149	Dunfee, Thomas, 1:381
advancement of women and minorities, 2:147–148	Dunn, Patricia, 2: 383, 386
attitudes towards, 2:145	Dunne, James (Jimmy), 1: 106, 107
criticisms of, 2:148	Dunning, J., 1: 202
defining, 2: 140–144	Dunning, John, 1:377
diversity in, 2:146	Dupont, 1: 256, 274
emergence of, 2: 141	Dyadic alliances, 1: 331
future directions of, 2:148–149	Dyer, J. H., 1: 325
and globalization, 2:148	Dynamic capabilities, 1: 476
for groups, 2: 145–148	Dynamic environments, 1:19
history of, 2: 141	Dynamism, 2:25
individual-level interventions/outcomes, 2:144–145	Dynergy, 1: 108
mentoring programs for, 2:145	Dysphoric self-consciousness, 2: 233–234
models of, 2: 141–144	
moderator variables for, 2:146	EAN International, 2: 412
networking programs for, 2:145	Earley, P. C., 2: 37, 307
and organizational development, 2:142	Early movers, and business imitation, 1: 402
for organizations, 2:145–148	Earth Day, 1: 272
and profitability, 2:147	Earthquakes, 1:201
training for, 2: 144–145	East Asia, foreign impact in, 1:214
Diversity training, 2:144–145	Eastman Kodak, 1:356, 360
Dobbin, Frank, 2:147	Eastman School of Music, 1:493
Dobbs, Lou, 1:89	Ebers, M., 2: 293
Documentation, for outsourcing, 1:448, 449	E-Business, and supply-chain management, 1: 409
Document management, 1:454	Ecological footprint analysis, 1:465
Documents, 2:339–340	Ecological systems theory, 2:80
Dodge, G. E., 2: 296	E-commerce (electronic commerce)
Dodge, Wag, 2:474	and IIOS, 1:313, 316–317
Domain name system (DNS), 2:414	multilingual issues with global. See Multilingual is-
Domain specialization, and outsourcing, 1:359	sues in global e-commerce Web sites Economic imperative, 1:378
Domestic organizational forms, 2: 325 Domestic partner benefits, 2: 177	Economic recession, 1:404
Domestic policy, 1:207	Economics rents, 1:327
Donaldson, Thomas, 1: 381	Economic theories
Dore, R., 2:67	of environmental regulations compliance, 1: 262–264
"Dot.cause," 1:135	of imitation, 1:400–401
Dow, 1:274	Economies of scope, 1:342
Dow Corning, 2:4	Economist Intelligence Unit, 1: 191
Downsizing, 2:135	Economy and economic organization
and mid- and late careers, 2:135	breakdown of national baronies in Asian, 1: 233
in new economy, 2: 69–71	as culture division, 2: 251
and organizational security, 1: 506	outsourcing gains to, 1:357–358
Downstream boundary, 1:372	terrorism and international political, 1: 204–205
Doz, Y., 2: 240	Ecover, 1: 465–466
Doz, Y. L., 2: 35	Eden, D., 2: 301
Dr. Reddy's, 1: 232	EDIs (electronic data interchanges), 1: 313

Edmondson, A., 2: 40, 475	defining, 2: 260–261
Education	and emotional disposition (traits), 2:261
and intercultural adaptation, 2:254	and emotional intelligence (EI), 2:262-263
and intrinsic motivation, 2:198	and emotional labor, 2:263
level of, 2: 198	and employee turnover, 2:265
universal, 1:48	future research on, directions for, 2:267–268
of women entrepreneurs, 1:54	and goals, 2: 264–265
and women managers' success, 1:163	and job performance, 2:264
Educational programs, 2: 136	and leadership, 2:264
Eesley, C., 1:128, 134	and leadership development, 2:265-266
Effectiveness, RFID benefits for, 2:416–417	and motivation, 2: 264–265
Efficiency, RFID benefits for, 2:416	and negotiation, 2:263–264
Efficient consumer response (ECR), 1:411, 412	research on, 2:263–265, 267–268
Effort Recovery Model, 2:79	and romance in workplace, 2:266
Effron, M., 2: 57	and selection systems, 2:266
Egalitarianism, 2: 276	and stress, 2: 265
Ego-network perspectives, 1:332	theories on, 2: 260–263
Einstein, Albert, 1:467	and violence in workplace, 2:266
Eisenhardt, K. M., 2:19	Emotional conflict, 2: 146
Eisenhower, Dwight D., 1:91	Emotional disposition (traits), 2:261
Eizen, D., 2: 47, 49	Emotional intelligence, 2: 8–10
Ekman, Paul, 2: 267	Emotional intelligence (EI), 2:262–263
Elder care, 2: 176	Emotional labor, 2:263
Elderly workers, 2: 135–136	Emotional release, 2:385
E-leadership, 2: 281–282	Emotion recognition dilemma
Electrical Workers (IBEW), 1:168	and globalization, 2: 8–9
Electricité de France, 1: 102	and virtual work teams, 2:10–11
Electronic commerce. See E-commerce	and work teams, 2:6
Electronic Communications Privacy Act (ECPA), 2:373	Empire building, 2: 214
Electronic data interchanges (EDIs), 1:313, 412, 2:420	Employability, 2: 95–97, 122, 126, 127
Electronic Data Systems (EDS), 1:357, 360	Employee(s). See also Benefits
Electronic mediated environments, 1:414–415	and ambiguity resolution, 2:243–244
Electronic monitoring of personal Web use at work. See	attitudes of, 2:196
Personal Web use monitoring	and boss, 2: 244
Electronic performance monitoring, 2: 371	and influence on others, 2:243
Electronic Product Code (EPC), 2: 412	and initiative, 2: 243
Elkin, G., 2: 111	and intrinsic motivation, 2:196
Elkington, J., 1: 259	intrinsic motivation and behavior of, 2:196–197
E-mail, 2: 11, 288, 363, 364, 373	and leadership, 2: 243
EMAS (European Eco-Management Audit Scheme), 1: 118 "Embeddedness," 2: 132	monitoring environmental compliance of, 1: 264–265 and network building, 2: 243, 244
Embedded spaces, working in, 2: 354–356	organizational security and awareness of, 1:501,
Emerging economies, and culture, 1: 382	504, 505
Emerging markets, 1:304	and persistence, 2: 243
Emerging network markets, 1: 306–307	and promoting others, 2: 244
Emerging organizations. See Organizational emergence	and risk taking, 2: 243
Emerson, 1: 231	and self-improvement assignments, 2: 243
EMI, 1: 305	and skill building, 2: 244
Emissions control, and ethical manufacturing, 1:466	strategies of, for work-home interaction, 2: 81–82
Emotion, 2:259–268	and value-adding activities, 2:243
and Affective Events Theory (AET), 2:261–262	Employee assistance programs (EAPs), 2:82, 136, 228
and Affective Infusion Model (AIM), 2:262	Employee Benefit Research Institute, 1:171
applications, 2: 263–266	Employee development, 1: 215–217, 2: 116
and change management, 2: 265	Employee recruitment, 2: 104
and creativity, 2: 263	Employee retention, 2:1 04
cross-cultural aspects of, 2:266–267	Employee Retirement Income Security Act (ERISA),
and decision making, 2:263–264	2:108

Employee Retirement Income Security Act of 1974, 2:60	at intraentrepreneur level, 1:63–65
Employee theft	and knowledge acquisition, 1:66
and organizational misbehavior, 2:225	and management capacity, 1:67
as organizational misbehavior, 2: 225	and mentorship, 1:67
Employee turnover	at organizational level, 1:67–69
and emotion, 2:265	and outside organizations, 1:68
and telework, 2:365	and self-efficacy, 1:63
Employee wellness programs, 2:103–109	and social identity, 1:65
as business imperative, 2:103–104	and social orientation, 1:64–65
challenges for implementation of, 2: 107–108	and social skills, 1:65
and illness prevention, 2:105	and team diversity, 1:65–66
implementation of, 2:106–108	and team morale and goals, 1:66–67
types of, 2: 105–106	theories of, 1: 61–62
Employer relations, 1:174–175	Entrepreneurs
Employment, part-time, 2: 174	characteristics of, 1:35
Employment dispute resolution, 2: 59–61, 61	strategic-planning role of, 1: 75
Employment flexibility, as HRM best practice, 1:215–217	teams of, 1: 35
Employment structure, and labor relations, 1:170	women. See Women entrepreneurs
Empowerment, for environmental decisions, 1:286	Entrepreneurship
Enculturation, and intercultural adaptation, 2:254	as concept, 1: 23–24
The End of Poverty (Sachs), 1:97	conventional/commercial vs. social, 1:25–26
Enforceable trust, 2: 152	corporate. See Corporate entrepreneurship
English Channel Project, 1:484–485	in creative foundations, 2:5 16
English language	ethnic minority. See Ethnic minority entrepreneurship
as Internet language, 2: 392	high technology. See High technology entrepreneurship
issues with, 1: 241–242	importance of, 1:32–33
Enlightenment, 1: 86–93, 2: 427, 431–432	minority. See Ethnic minority entrepreneurship
Enron, 1: 360	shifting from individual to corporate, 1:12
and groupthink, 1:111	social. See Social entrepreneurship
and organizational crisis management, 1:106, 108	as social network process, 1:35
Ensari, Nurcan, 2:142	start-up issues. See Organizational emergence
Enterprise application integration (EAI), 1:432	theories of, 1: 33–35
Enterprise data warehouse (EDW), 2:343	university, 1:36–37
Enterprise resource planning (ERP), 1:431–435, 438,	Entry, into market, 1:399
2: 411	Entry regulation, 1:46–47
defined, 1: 431, 432	Environment
in ERPII architecture, 1: 435	and CE-performance link, 1:19
in ERPII system, 1: 438	and global projects, 1:486
evolution of, 1: 433–435	and Internet-based interorganizational systems,
software for, 1: 432–433	1: 316–317
and supply-chain management, 1:414	Environmental change model, 1:276–278
Entrepreneurial activities, norm for, 1:68–69	Environmental dislocation, and global projects, 1:486
Entrepreneurial culture, 1:16	Environmentalism, 1:271–280
Entrepreneurial management, 1:16	and businesses, 1:271–272
Entrepreneurial orientation (EO), 1:16–17	change agents for, 1:278–279
Entrepreneurial strategies, 1:15	early drivers of corporate, 1:272
Entrepreneurial teams	evolution of corporate, 1:274–275
diversity of, 1:65–66	institutionalizing corporate, 1:279
diversity of, and entrepreneur resilience, 1:65–66	legislation pertaining to, 1:272–274
morale/goal consistency of, 1:66–67	model for, 1: 276–278
Entrepreneur resilience, 1:60–69	and social responsibility, 1:275–276
and creative intelligence, 1:63–64	and sustainability, 1:275–276
factors influencing, 1: 62–63	Environmental jolts, 1: 110
future research, directions for, 1: 69	Environmental limits, and sustainability, 1: 251–252
and important others, 1:66	Environmental logistics, 1: 121
and industrial practices, 1:68	Environmental Management Systems (EMS), 1:257–258,
at interpersonal level, 1: 65–67	282, 286

and emissions control, 1:466
and green supply-chain, 1:468
and "greenwash," 1: 468–469
and industrial ecology, 1:465–466
and industrial sectors, 1:462–463
and practices, 1:462
and processes, 1:462
and product, 1:462
and sustainability, 1:465
and waste management, 1:466
Ethical relavatism, 1:144
Ethical sourcing, 1:124
Ethical Trading Initiative (ETI), 1:99, 103
Ethics
and culture-sensitive global strategies, 1:384
and developing countries, 1:196
in logistics, 1: 120
in purchasing, 1:123
Ethnic economy, 2: 153
Ethnic enclaves, 2:153
Ethnic groups, 2:150
Ethnicity, 2:137
and intrinsic motivation, 2:198
and labor relations, 1:170
Ethnic minority entrepreneurship, 2:150–157
applications of theories for, 2:155–156
comparison of theories for, 2: 156
cultural theories for, 2: 151
defining, 2: 150–154
explanations of, 2: 151–154
future research, directions for, 2: 156–157
methods, 2:154–155
network theories for, 2:152–153
opportunity-focused theories for, 2:153–154
resource-based theories for, 2: 153–154
structural theories for, 2:151–152
Ethnic resources theory, 2: 153–154
Ethnocentric mindset, 1: 180
Ethnocentric-polycentric-regiocentric-geocentric (EPRG)
profile, 1: 380–381
Ethnocentrism, 1: 222, 380
ETI. See Ethical Trading Initiative
EuroNews, 2:393
Europe, 2:115. See also specific countries
cost saving from outsourcing from, 1:357, 358
ethnic minority entrepreneurs in, 2:1 50
European Commission, 1: 57, 464, 2: 77, 95
European Eco-Management Audit Scheme (EMAS),
1:118
European Union (EU)
and ethical manufacturing, 1: 468
and global business citizenship, 1:140
and network markets, 1:304
and outsourcing, 1:444
and poverty, 1:96
and women entrepreneurs. 1:57

Evaluation	and RFID, 1: 437–439
of performance, 2:116–117	in supply chains, 1: 431–440
of potential, 2: 116–117	Extended work involvement, as career strategy, 2:125
"Evaluation routine," 1: 299	External competitiveness, and pay level. See Pay level
Evans, J., 2:99	decision making
Evans, P., 2:16, 17	External functional flexibility, 2:99–100
Everyday low pricing (EDLP), 1: 412	consequences of, 2:100
The Evolution of Cooperation (R. Axelrod), 1:390	reasons for, 2: 99–100
e-Work, 2: 351	External intrinsic opportunities, 2:195
e-Work, individual, 2: 351–352	Externalization, 2:337
Exaggerated perception of conspiracy, 2:236	External numerical flexibility, 2: 97–99
Excess inertia, 1:305	and offshoring, 2: 99
Excessive work. See Workaholism	and outsourcing, 2:99
Excess momentum, 1:305	reasons for, 2: 97–98
Exchange, and organizational emergence, 1:3	and research of, 2:98–99
Exchange-rate issues, and supply-chain management,	and subcontracting, 2:99
1:413	External salary level determination, 2: 89–90
Execution, and career self-management strategies, 2:114	External threats
Execution team task, 2:25	and organizational security, 1:504
Exit strategy, for outsourcing, 1:449	to organizational security, 1: 502
Exostar, 1:416	Extranets, 1: 505, 2: 411
Expatriate assignment, 2:117	Extroversion, 2:285
Expectancy theory, 1: 215, 2: 217–218	ExxonMobil, 1: 103, 2: 446
Expectational gaps, 1:97	,
Expectations, 1:66	"Face time," 1:150
and entrepreneur resilience, 1:66	Face-to-face interaction, 2:282–283, 363
and gender-role stereotypes, 1:162	Face-to-face teams, 2:353
and network markets, 1:304–305	Facilitating, of leadership activities, 2:297
in network markets, 1:304–305	"Factor X" improvements, 1:256
Experience, 2: 133, 134	Failure
leveraging alliances', 1: 339–340	and artistic methods, 1:495
and mid- and late careers, 2:133	defined, 1:6
Expertise, 2: 133, 451	Failures. See Catastrophic organizational failures
Expertise game, 2:214	Fairhurst, G. T., 2: 245
Experts-Exchange.com, 2:18	Fair Labor Association, 1:99
Explicit decision competence, 1: 297–298	Fair Labor Standards Act (FLSA), 2:61–62
Explicit knowledge, 2: 336	Fairness
Explicit motives, 2:206	perceptions of, 2: 144, 217–218
Explicit transactions, 1: 337	of personal Web use monitoring, 2: 374
Exploration and exploitation	and political behavior, 2:217–218
and global projects, 1:486	Fairness perceptions, 1:221–228
and organizational structure, 1:472–479	conceptual model of, 1:223
Explorers, 2:136	cross-cultural justice research on, 1:225–226
Extended enterprise (ERPII), 1:431, 433–440	culture's role in shaping, 1:223–225
architecture of, 1: 435–437	and distributive justice, 1:225–226
defined, 1: 431	future research, directions for, 1:226
evolution of, 1: 433–435	and individualismcollectivism, 1:224
obstacles to, 1: 439–440	and interactional justice, 1:227
rationales/benefits of, 1:436	and masculinityfemininity, 1:224
rationales/benefits with, 1:436	organizational justice research on, 1:223
RFID in, 1: 437–439	and power distance, 1:224
Extended enterprise applications (EEA), 1:431–440	and procedural justice, 1: 226–227
defined, 1:432	and uncertainty avoidance, 1: 224–225
and ERPII architecture, 1:435–437	Fair Trade label, 1: 103
and evolution of ERP/ERPII, 1:433–435	Family(-ies), 2: 110
obstacles to, 1: 439–440	open systems view for, 2: 171–173

and telework, 2: 362–364	Fickensher, L., 2: 104, 106
and teleworking, 2:368	Fiedler, F. E., 2: 275
and women managers' success, 1:163	The Fifth Discipline (Senge), 2:432
and work, 2: 171–173	Fillis, I., 2: 488
Family and Medical Leave Act of 1993, 2:60	Film industry, 1:485
Family-friendly organizations, 2:170–179	Film production, 1: 482–483
and adoption assistance, 2: 177	Finance
backlash to, 2:177	business process outsourcing of, 1: 446
benefits to employees of, 2: 175–177	outsourcing of, 1: 446
best practices in, 2: 178–179	Financial analysts, and supply-chain management, 1: 416
and compressed workweeks, 2: 173–174	Financial assessment, of business process outsourcing,
and domestic partner benefits, 2: 177	1:447
and flexible scheduling (flextime), 2:173–174	Financial capital, and ethical manufacturing, 1: 466
future research on, directions for, 2: 178–179	Fincher, R. D., 2: 60
global perspectives on, 2:177–178	Fine, G., 2: 235
and job sharing, 2:174–175	Finland
and lactation rooms, 2: 177	and development, 1: 191
open systems view for, 2:171–173	language issues in, 1: 243, 244, 245
and part-time employment, 2:174	mobile/virtual work in, 2:359
practices of, 2:173–176	telecommuters in, 2:175
and productivity, 2:178	and women entrepreneurs, 1:53
and school vacation programs, 2:177	Fiorina, Carly, 2: 383, 386–387, 389
and telecommuting, 2:175	Fire, and organizational security, 1:507
and workaholism, 1:152	Firewalls, 1: 502, 504
work schedules in, 2:173–175	Firm government co-opetition, 1: 392
Family-friendly workplace policies, 2: 133	Firms, and flexible labor, 2: 93–95
Family-leave programs, 2:136	and external functional flexibility, 2: 99–100
Family life, and teleworking, 2: 367	and external numerical flexibility, 2: 97–99
Family members, and employee, 2: 108	and internal functional flexibility, 2: 95–96
Family structure, host culture of, 2: 255	and internal numerical flexibility, 2:94 –95
Family-work balance. <i>See</i> Work-family balance	Firms, employability within, 2: 95–97
Farrell, Joe, 1:306–307, 309	First City Bank, 1: 360
Fashion industry, 1: 485	First-person world of subjectivity, 2: 319
"Fashion leaders," 1: 401	First sale, as organizational emergence indicator, 1: 6
Fastow, Andrew, 1:108	"Fit," 2:131
Fatalism, 1:195	and career management, 2: 112–114 and mass customization, 1: 423–424
Faulkner, D., 2:293	
Faultline, 2:45	Fit model, 2:80
Fax machines, 1:304	Fitness centers, 2:106
Federal Bureau of Investigation (FBI), 2:372	Fitness for purpose, 1:453, 457–458
Federal Drug Administration (FDA), 1:40	Fixed solution space, 1:423
Federal Emergency Management Agency (FEMA), 2:497	"Flattening of the world," 1:444
Federal Highway Administration, 2:365	FleetBoston, 2:2, 5
Federalist Papers, 1:87–88	Fleming, Arthur, 1:497
Federation of Professional Athletes, 1:172	Flexibility, 2:133
FedEx Corporation, 1:427	in development alliances, 1:338
Feedback, 2:113	employment, 1:215–217
in creative foundation management, 2: 513	as intercultural guideline, 2:257
and mass customization, 1:425	and office design, 1:455–456
Fein, S., 2:236	in office design, 1:453
Feldman, D. C., 2: 134	and outsourcing, 1:445, 446
Felfe, J., 2:305, 306, 307	Flexible accumulation, 1:204
Femininity, and fairness perceptions, 1:224	Flexible labor, 2:93–101
Feminist movement, 2:171	developments in, 2:101
Fenigstein, A., 2:232, 233	and employability, within firm, 2: 95–97
Ferris, Gerald, 2:212	and external functional flexibility, 2:99–100
Feuille, P., 2: 60	and external numerical flexibility, 2:97–99

and firms, 2: 95–100	Fostering social and civic responsibility by organiza-
framework for, 2:94	tions and their people. See Social and civic
and functional flexibility, 2:94–100	responsibility
and internal functional flexibility, 2:95–97	Foundation(s). See also Philanthropic organization
and internal numerical flexibility, 2:94–95	management
need for, 2: 93–94	management of, 2:510
and offshoring, 2:99	stage of, 2: 124
and outsourcing, 2:99	Foundations and Trends in Entrepreneurship series, 1:7
and subcontracting, 2: 99	Four Rs (reduce, reuse, recycle, and recover), 1:465
win-win situations with, 2:100–101	Four-stage creative process, 2:4 53
and workers, 2: 95–100	Fox, Suzy, 2: 264
and working-time, 2:94–95	Framing of leadership activities, 2: 297
Flexible scheduling (flextime), 2:173–174	France, 2: 95, 266
Flexible systems, 2:82–83	Allied invasion of, 1:484
Flexible-time schedule, 2: 136	Asian colonization/occupation by, 1:214
Flexible working hours, and culture, 1: 379	and development, 1:191
Flexspace, 2:352	and English Channel Project, 1:484
Flextime, as family-friendly practice, 2: 173	fashion industry in, 1:485
Flextonics, 1:230	performance effectiveness in, 2:331
Floods, 1:507	and September 11, 2001, terrorist attacks, 1:204
Flow, and mass customization, 1:425	and women entrepreneurs, 1:53
Flow experience, 2:208	Franchising, and organizational structures, 1:476
Fluid intellectual abilities, 2:162, 163	Franklin, Ben, 1:151
"Flying geese," 1:232	Free agency market, 2:130
Focused entrepreneurship, 1:14	"Free-agent" contractual labor, 1:172
Followers, 2:275	Free capital, and entrepreneurial creation, 1:48
Fong-Beyette, Margaret L., 2:81	Freedom, as creativity/innovation dimension, 2:457
Food and Commercial Workers (UFCW), 1:169	Freedom of the press, 1: 48
Foragas, Joseph, 2:260	Freeman, Robert E., 1:116
Forbes, D., 2: 488, 489	Freeman, S., 2: 488
Force-field analysis, in organization development, 2: 438	Free riding, 1: 342
Ford, Henry, 1: 40, 377, 461	FreeTranslation.com, 2:396
Fordism, 1: 204	French, as Internet language, 2:392
Fordist-Keynesian era, 1:205	Friedman, Milton
Ford Motor Company, 1: 169, 461, 2: 4	and poverty, 1:100
Forecasting	and social/civic responsibility, 1:88–89
and supply-chain management, 1:412	Friedman, Thomas, 1: 444, 463, 2: 332
in supply-chain management, 1:409, 410–411	Frito-Lay, 1:360
Foreign direct investment (FDI), 1:403	Frooman, M., 1:128
Foreign-invested enterprises (FIEs), 1:214	Fujitsu, 1:384
Foreign languages, instruction in, 2:255–256	Fukuyama, Francis, 1:377
Foreign subsidiaries, 1:244–245	Full Integration Theory, 2:143–144
Forgas, J. P., 2: 262	Functional differences, 2:26
Form	Functional flexibility
and artistic methods, 1: 493–494	external, 2: 99–100
content vs., 1:497	internal, 2:95–97
and mass customization, 1:424	Functionality, and mass customization, 1:424
Formal boundaries, 1:3	Functional organizations, 1:505
Formal education, 2:116	Functional strategy review, 1: 417
Formal entrepreneurial processes, 1:15	Future orientation, 1:380
Formal planning constraints, 1:475–476	Futurity, and sustainability, 1:251
Formal strategic planning, 1:77–78	Galbraith John Konnath 1.00
Foron, 1:132 Forrector, Jay 2:432	Galvin Poul 1:381
Forrester, Jay, 2: 432 Forrester Research, 1: 426	Galvin, Paul, 1: 381 Game theory, 1: 390
Forsyth, D. R., 2:304	Gandossy, R., 2: 57
Forward buying, 1: 409	Gap, 1: 256
1 of ward duying, 1. To	Oup, 1.200

GAP analysis, 1:78	Gini-coefficient, 1:96
Garbage-can model, 1:296	Glaeser, E., 2: 95
Garland, Texas, 2:104	Glass ceiling, 2: 77, 332
Garud, R., 1:307	Global boundaries, 2:29
Gates, Bill, 2:403	Global business citizenship (GBC), 1:138–147
G8 Summit, 1:97	approaches to, 1: 141–143
GEM. See Global Entrepreneurship Monitor	characteristics of, 1:141
Gender. See also Women	communitarian approach to, 1:142–143
and implicit leadership theories, 2:305	comparative views of, 1: 143
and intrinsic motivation, 2:198	and corporate citizenship, 1:140
Gender egalitarianism, 1:380	emerging challenges, 1:139–140
Gender equity movement, 2:170	and global citizenship, 1:140
Gender-role stereotypes, 1:162–163	implentation guidelines for, 1:144–146
Genentech, 1:39	and learning, 1: 145–146, 146
General Electric (GE), 1:416	and local citizenship, 1:140, 141
General Electric GE) Medical Systems, 1:237–238	local implementation of, 1:145
Generalization hypothesis, 2: 79	minimalist approach to, 1:141–142
General Mills, 2: 107, 446	and nature of citizenship, 1:140
General Motors, 1: 130, 360, 473, 2: 107, 108	and problem analysis/experimentation, 1:145–146
Generation team task, 2: 25	process of, 1: 143–144
Generation Xers, 2: 162	and states of citizenship, 1:140–141
Generation Yers, 2: 162	in 20th century, 1: 138–139
Generativity factor, 2: 132	universal principles approach to, 1:143
Geocentric mindset, 1:180	and values, 1:145
Geocentrism, 1:381	Global careers, 2:128
Geographical distance, 2:353	Global citizens, 1: 141, 2: 117
Geographic boundaries	Global Compact
of global teams, 2:27	and corporate social responsibility, 1:118
of work teams, 2: 50–53	and global business citizenship, 1:145
Geographic information systems (GIS), 1:413	and poverty, 1:104
Geographic market, 1:393	Global e-commerce Web sites, multilingual issues with.
Georgia (country), 1: 49	See Multilingual issues in global e-commerce Web
German, as Internet language, 2:392	sites
Germany, 2: 95, 96	Global Entrepreneurship Monitor (GEM), 1:8, 32
aging in, 2: 160	and high technology entrepreneurship, 1:32
Allied invasion of, 1: 484	and women entrepreneurs, 1:51–53, 58
and culture, 1:380	Global environment, and organizational security, 1:503
and development, 1:191	Global environmentalism, 1:252
mobile/virtual work in, 2:359	Global gross domestic product (GDP), 1:230
perceived fairness in, 1:225, 226	Global Information Security study, 1:501–502
performance effectiveness in, 2: 331	Globalization, 1: 178, 2: 252, 332, 440
and women entrepreneurs, 1:53	and activist groups, 1:134, 135
and workaholism, 1:152	and business process outsourcing, 1:444
Gestures, 2: 255	and career management, 2:117
Geurts, A. E., 2: 78	and cities, 2: 252
Ghemawat, Pankaj, 1:378	and diversity management, 2:148
Ghoshal, Sumantra, 1:180, 181, 378, 2:35–36	and emotion recognition dilemma, 2:8–9
Ghosn, Carlos, 1:362	and ethical manufacturing, 1:463
Gibbons, D. E., 2: 240	geography of, 1:203
Gibbs, J. L., 2: 38	and HRM best practices, 1:212
Gibraltar, 1:191	and information asymmetry dilemma, 2: 9
Gibson, C. B., 2: 38	and interest asymmetry dilemma, 2:9
Gibson, H. D., 1: 346	and interfirm arrangements, 1:202–203
Gilbert, R. J., 1:306	and labor relations, 1: 169–170, 173–174
Gillette, 2:8	and leadership, 2:275–276
Gilmer v. Interstate/Johnson Lane, 2:61	and organizational structures, 1:477
Gilovich, T., 2: 236	and self-interest dilemma, 2:8

and social/civic responsibility, 1:84-85	and organic processes, 2:30–31
and supply-chain management, 1: 410	organizational borders of, 2: 27
and terrorism, 1: 202–204	selecting processes for, 2: 32–33
and work teams, 2:8–9	social identity of, 2:26–27
Global Leadership and Organizational Behavior Effec-	tasks for, 2: 25–26
tiveness (GLOBE), 1: 379–380	and team cognition, 2:31–32
Global management, 2:323–333	temporal boundaries of, 2: 27–28
competencies for global leaders, 2:328–329	theories for, 2: 29–32
cross-cultural values in, 2: 327–28	Global Union Federation, 1:173
cultural adaptability in, 2:327	Global warming, 1:85, 466
cultural intelligence in, 2:328	GLOBE project, 2: 275–276, 302, 303, 328
culture shock in, 2:327	"Glocalization," 2:396
current practices in, 2:331–333	Goal commitment, 2:204
current research on, 2: 329–331	Goal consistency
defined, 2: 325	of entrepreneurial team, 1:66–67
global mind-set in, 2:327	and entrepreneur resilience, 1:66–67
and global organizations, 2: 324–325	Goals
international management vs., 2:326	alignment of, 2:217
and learning to learn, 2:328	and emotion, 2: 264–265
origins of, 2: 324	and joy, 2: 208–209
Global mind-set, 1:178–188, 2:327	non-motivating. See Self-set goals, and non-
concept of, 1: 179–180	motivation
cultural perspective on, 1: 180	of organization, 2:222
future research, directions for, 1:187–188	and organizational misbehavior, 2:222
individual development of, 1:187–188	and political behavior, 2: 217
literature about, 1:179	self-set, 2: 205
and managerial action, 1:183–184	in strategic planning, 1:77
multidimensional perspective on, 1:182–183	in young SMEs, 1:77
organizational development of, 1:185–187	Godschalk, V. M., 2:118, 125
and selection practices, 1:185–186	Goetzel, R. Z., 2:107
and strategic capabilities, 1:184–185	Goldman Sachs Foundation, 1:29
strategic perspective on, 1:181–182	Goldsmith, M., 2:57
and training, 1: 186–187	Goleman, Daniel, 2:260, 262
Global organizations, 2:324–325	Goltz, J., 2: 494
Global positioning systems (GPS), 1:413, 2:371, 381	Good, right vs., 1: 463
Global projects, 1:482–488	Google, 1: 37, 44, 2: 393
defined, 1: 483	Google Desktop, 2:469
distinguishing work roles/identities/skills in, 1:483	Gore, Al, 1: 469
drivers of, 1: 484–486	and poverty, 1:97
environmental transformation of, 1:486	and social/civic responsibility, 1:85
future directions for, 1:487–488	Goudswaard, A., 2:97
as organizational forms, 1:486–487	Governance
and singularity/agency, 1:482–483	and activist tactics, 1:129–130
and World War II, 1:484	in arts management, 2:486–487
Global sales forces, 2:348–349	of sport organizations, 2:508
Global strategies, culture-sensitive. See Culture-sensitive	Government(s)
global strategies	and arts management, 2:484–485
Global teams, coordination in, 2:24–33. See also	and environmental supply chain management, 1:289
Transnational teams, in knowledge-intensive	Governmental impedimentation and facilitation of
organizations	entrepreneurship, 1:42–49
boundaries of, 2:26–29	bureaucrats, role of, 1:45–46
and communication, 2:31	and capital, 1:48
and culture, 2: 28–29	and corruption, 1:47–48
functional differences in, 2:26	and diversity, 1:48
geographic boundaries of, 2: 27	entry regulation, 1: 46–47
global boundaries of, 2: 29	and freedom of press, 1:48

funding, **1:**36

and mechanistic coordination, 2:29–30

and intellectual property rights, 1: 44–45 and political rent seeking, 1: 47	Group processes, and artistic methods, 1: 492 Groups
and private property rights, 1: 43–46	diversity management for, 2:145–148
and quality of government, 1:42–43	effects of personal Web use monitoring on, 2:375–376
and shareholder rights, 1:43–44	Groupthink, 1:110–111, 164, 2:473, 475
and trade openness, 1:48	Group viability, of work teams, 2:3
and universal education, 1:48	Grove, Andrew, 2:237
Governmental organizations, and entrepreneur resilience,	Grover, S. L., 2: 240
1:68	Grover, V., 1:315, 317
Government policy	Growth
and environmental compliance, 1:268–269	and intrinsic motivation, 2:194–195
for women entrepreneurs, 1:57	organizational structure and constraints on, 1:476–477
Government regulation, and human resources manage-	women entrepreneurs' perceptions of, 1:56–57
ment, 2: 61–62	G3 telecommunications network, 2:25
Government relations, in sport organizations, 2:503–504	Guay, T., 1:130
Govindarajan, V., 1: 181, 186, 187, 2: 36	Guest, D., 2: 111
Graen, G. B., 2: 239, 241, 242, 244, 245, 247	Guest office, 2:355
Graen, J. A., 2: 239, 241	Gulati, R., 1:325, 339
Grant, R. M., 2: 36	Gunz, H., 2: 118
Great Britain. See United Kingdom	Gupta, A. K., 1: 181, 186, 187, 2: 36
Greece	Gurbaxani, V., 1:314
and culture, 1:380	Gutteridge, T. G., 2:117, 118
and development, 1:191	Gwartney, J., 1: 194
uncertainty avoidance in, 1: 224	3 / /
and women entrepreneurs, 1:53	Haas, M. R., 2:40, 41
Green, Sandy, 1:108	Hackborn, Richard, 2:387
Greenhaus, Jeffrey H., 2: 79, 118, 125	Hacker, Jacob, 1:89
Greenhouse, S., 2:57	Hackers, 2: 373
Greenhouse gases (GHGs), 1:463, 466	and organizational security, 1:504
Green issues, in supply-chain management, 1: 412–413	Hackman, J. R., 2: 3
Green Paper, 1:117	Hage, J., 2: 293
Greenpeace, 1: 127, 129, 132	Hagedoorn, J., 1: 336
Green purchasing, 1:284	Hagger, Peter, 2:97
Green supply chain management, 1: 282, 468. See also	Haiti, 1: 191
Environmental supply chain management	Hall, Douglas T., 2:77, 81, 115, 123, 130
Green Wall, 1:271	Hall, Francine S., 2:77
'Greenwash," 1: 468–469	Hambrick, D. C., 1: 349, 2: 37
Gregersen, H. B., 1: 182, 2: 117	Hamel, G., 1: 330
Greiner, Larry, 1:109	Hamilton, Alexander, 1: 87
Greller, M. M., 2: 135	Hammer, L. B., 2: 133
Grewal, R., 2: 241	The Handbook of Entrepreneurial Dynamics: The Process
Grid OD, 2: 439–440	of Organization Creation (Gartner et al.), 1:7
Grievance systems, nonunion, 2:5 9–60	Hanover, Jeanne, 2:145
Griffith, T., 2: 38	Hansen, M. T., 2: 39, 40
Grocery industry, and supply-chain management, 1: 409	Hanson, J., 2: 240
Gross domestic product (GDP)	Happiness, 2:264
and development, 1: 191	Hargadon, A. B., 2: 16
and globalization, 1:190	Harvard University, 1:181, 473
and mergers, 1: 346	Harveston, P. D., 1: 181
and September 11, 2001, terrorist attacks, 1: 204	Harvey, D., 1: 201, 204, 205, 207
Gross Fixed Capital Formation, 1:346	Haslam, Alex, 2: 188
Group collectivism, 1:380	Hauser, J., 2:15, 18, 20
Group creativity, 1:453, 2:452	Hauser, J. R., 2: 19, 21
Group-level antecedents, of organizational misbehavior,	Hawthorne studies, 2: 4, 196
2:222–223	Hayward, M. L. A., 1: 349
Grouplike work, 2: 358	Hazardous waste, 1:467
p	

HAZWOPER, 2:492	High-trust societies, 1:377–378
HDI (Human Development Index), 1:191	Hinds, P. J., 2:46, 48
Health Alert Network (HAN), 2:495	Hiroshima, 1:484
Health care, 2:132	Hitachi, 1:384
Health-care costs, 2:103	Hitachi Foundation, 1:139
Health care organizations, 2: 477–478	Hochschild, Arlie, 2:260, 263
Health-care premium, 2:106	Hock, D., 2: 513
Health care providers, RFID use by, 2:419–420	Hofer, C. W., 1:311
Health coverage portability, 2:108	Hoffman, A. J., 1:130
Health insurance, 2:104	Hofmeister, H., 2:136
Health Insurance Portability and Accountability Act of	Hofstede, 2:327, 337
1996 (HIPAA), 2: 108, 373	Hofstede, Geert, 1:193, 224–225, 379, 2:37, 256
Health promotion programs, 2:103–104	Holidays, 1:145
Health risk appraisals, 2:105–106	Holistic tools, 1:368
Health-risk assessment, 2:106	Holland, J. L., 2:131
Health status, 2:103	Hollenbeck, George, 1:187, 2:326
Healy, P. M., 1: 347	Holonic complementarities, 2:320
Heckscher, C., 2:66, 67	Holons, 2:314
Hedging inventory, 1: 411	Holyfield, L., 2: 235
Heifetz, R. A., 2:296	Home-based telework, 2:351
Heilman, M. E., 2:305	Home-based workers, 2:362
Henderson, Bruce, 1:377	Homeland Security Presidential Directive 5 (HSPD-5),
Herd behavior, 1: 400–401	2: 496
Herding model (of merger paradox), 1: 350	Home office, 2: 355
Hersey, Rexford, 2:259	Homesteaders, 2:136
Herzberg, F., 2:96–97	Honda, 1:381–383
Heterogeneity condition, 1: 328	Honeywell, 1:362
Heterogeneous environments, 1:19	Hong Kong
Heterogeneous preferences, 1:309	demographics, 1:213
Hewlett, Walter, 2:383	HRM practices in, 1:215
Hewlett, William R., 2:383	manufacturing in, 1: 232
Hewlett-Packard (HP), 1:342, 2:2	Hopkins, Nicholas, 2:189
information privacy at, 2:383, 386–388	Horizontal co-opetition, 1: 391–393
and supply-chain management, 1:409, 410	Horsepower, 1:490
Heydens-Gahir, Heather A., 2:82	Hospital Emergency Administrative Radio (HEAR),
Hey Math!, 1:363	2: 495
HHCL, 1:457	Hospital Emergency Incident Command System (HEICS)
Hick, J., 2:496	2: 495
Hierarchy of needs, 2: 216	Hospital Incident Command System (HICS), 2:495, 496
Higgins, M., 2:127	Hospital planning for weapons of mass destruction
Higgins, M. C., 2: 117	incidents, 2:491–500
High-definition television (HDTV), 1:399–400, 404	and citizen response to terrorism, 2:493–494
High frequency (HF), 2:413	decontamination, 2:498
High-intensity mobile workers, 2:352	hospital security, 2: 499
High reliability organizations (HROs), 1: 113, 2: 476–477	interoperable communications/information manage-
High technology entrepreneurship, 1:32–40	ment, 2:494–495493–494
in China, 1: 38–39	management system for emergency operations,
defined, 1:33	2: 495–496
and discovery to deployment path, 1:37–38	patient surge management, 2:496–497
dynamics of, 1: 39–40	personal protective equipment, 2: 498–499
importance of, 1:32–33	protection of staff/patients/visitors, 2: 497–499
and theories of entrepreneurship, 1:33–35	regional relationships, 2: 492–493
and U.S. innovation system, 1:35–37	and standards/regulations for hospital planning, 2: 492
High-technology industries	training and exercises, 2: 499
and co-opetition, 1: 391	universal precautions, 2: 498
co-opetition in, 1:393–394	Hospital rapid response teams (HRRTs), 2:2

Hospitals, 2:478	sustainability in, 1:258
Host cultures, 2:256	and work-home interaction, 2:78–84
Hostile environments, 1: 19	Human resource management (HRM) systems, 2:117
Hostility, and organizational misbehavior, 2: 224	Human resources
Howard, A., 2: 117	business process outsourcing of, 1:446
Hoye, R., 2: 506, 508	outsourcing of, 1: 446
HRM best practice(s), 1:209–219	and women managers' success, 1:164
Asia-Pacific region transfer of, 1:214–216	Humor, as creativity/innovation dimension, 2:457
defined, 1: 210–212	Hungary, 1:380
employee development investment as, 1:215–217	Hunsaker, Kevin, 2:386, 387
employment flexibility as, 1:215–217	Hunt, J. G., 2:296
future research, directions for, 1:217–219	Huntington, Samuel, 1:379
performance-based rewards as, 1:215–217	Hurd, Mark, 2: 383, 387
rationale for transfers of, 1:212–213	Hurricane Andrew, 1:201
research on, 1: 210, 211	Hurricane Katrina, 1:108, 113, 2:2, 496-497
transfer issues with, 1:213–214	Huselid, M. A., 2:87
Western vs. traditional Asian, 1:215–216	Huxham, C., 2:295, 296
Hsu, Francis L. K., 2: 256	Huy, Q. N., 2: 66
Huber, G. P., 2: 462	Huyck, M. H., 2:131
Hubris theory (of merger paradox), 1:349	Hybrid NGOs, 1:128
Hui, C., 2: 242, 244	
Hulst, Rudie, 1:135	Iacocca, Lee, 1:461
Human capital, 2: 218, 404	IBEW, 1: 168
in customer value development, 2:403	IBM. See International Business Machines
deficiencies in, 2: 407	IBM Business Consulting Services, 2:446
and ethical manufacturing, 1:466	IBM India, 1: 447
in successful product development, 2:406	IBM USA, 1: 447
and women managers' success, 1:158	Iceland, 1:191
Human Development Index (HDI), 1:191	Idea generation, and Web-based customer knowledge,
Humane orientation, and culture, 1:380	2: 18–19
Human intellectual capital, 1:85	Idea selection, and Web-based customer knowledge, 2:19
Humanism, 2: 436–437	Ideation, as culture division, 2:251
Human relations movement, 2: 193, 195	Identification phase, in decision process, 1:299
Human resource development (HRD), and organizational	Identity(-ies)
development, 2:435	on global projects, 1:483
Human resource information systems (HRIS), 2:116	social, 2: 26–27
Human resource management (HRM), 2:56–63, 111,	and workaholism, 1:149
115	Ideology, and intercultural adaptation, 2:254
best practices. See HRM best practice(s)	Idsoftware.com, 2:19
conflict management with, 2:60–61	IIOS maturity, 1: 317, 318, 319
contemporary, 2:56–57	Illness prevention, 2:105
defining, 2:56	Image building, as career strategy, 2:125
"dual theory" of, 2:58	Imperialist corporations, 1:381
and employment dispute resolution, 2:59-61	Implicit leadership theories (ILTs), 2:301–309
and globalization, 1:185	and attribution of performance to leaders, 2:302
"high-involvement," 2:58	and career success, 2:305
history/development of, 2:57–58	contents of, 2: 308–309
and lawsuits, 2:61	culture and, 2: 303
"low-involvement," 2:58	and decision making, 2:305–306
and managerial misclassification, 2:62-63	development of, 2: 307–308
in new economy, 2:71	and gender/culture, 2:305
and nonunion grievance systems, 2:59–60	and images of leaders, 2:302
and organizational financial performance, 2:58–59	as management challenges, 2:306–307
and organizational development, 2: 435	and perception of leadership, 2:304
and regulation, 2: 61–62	and performance evaluation, 2:305
in retail sector, 2: 63	and romance of leadership, 2: 303–304
in sport organizations, 2:506	and satisfaction with leader's performance, 2:304–305

and self-concept, 2:303	Individual e-work, 2:351–352
social construction and information processing, 2:302	Individualism, 2:110
social identity theory, 2: 303	and fairness perceptions, 1:224
Implicit motives, 2:206	and self-interest dilemma, 2:8
Implicit transaction (organization) costs, 1: 337	Individual-level antecedents, of organizational misbehav-
Improvisation skills, 1: 298	ior, 2: 223
Inbound logistics	Indonesia
in environmental supply chain management,	demographics, 1:213
1:285–286	economic growth in, 1:230–231
RFID in, 2: 414–415	HRM practices in, 1:215
Inbound spillover rent, 1: 330–331	manufacturing in, 1:230, 232
Inbound spillover rents, 1: 330–331	and social corporate responsibility, 1: 124
Incentives, 2:106, 114	Industrial Age, and social/civic responsibility, 1: 84
activity-based, 2:208	Industrial ecology
in supply-chain management, 1: 415–416	and ethical manufacturing, 1: 465–466
Incident Command System (ICS), 2:495	and sustainability, 1: 256
Incivility, 2:224	Industrialization
Income, and labor relations, 1: 171	in LDCs, 1: 191
Incompatible innovation, in network markets, 1: 309–310	and workaholism, 1:151
An Inconvenient Truth (film), 1: 85	Industrialized countries (developed countries, transition
Incremental innovation, 1:306, 310–311	economies), 1: 191
Incumbent monopolist networks, challenging, 1: 308–311	Industrial organizations (IOs), technological uncertainty
Incumbents, challengers vs., in network markets,	in, 1: 311
1:307–311	Industrial practices, and entrepreneur resilience, 1: 68
Independence, as career anchor, 2: 127	Industrial revolution, 2:120
India	Industrial sectors, and ethical manufacturing, 1: 462–463
and activist groups, 1:134	Industry differences, in environmental supply chain man-
and artistic methods, 1: 491	agement, 1:289
and China-India factor, 1: 232	Industry ecology, 1:465
in competitive environment, 1: 232	Industry size, and death rates of new firms, 1:34
consumerism in, 1:233	Industry standards, and business imitation, 1:403
diversity in, 2:148	Industry structure, and labor relations, 1: 170
economic growth in, 1: 230	Industrywide ethical standards, and culture-sensitive
and ethical manufacturing, 1: 461	global strategy, 1:384
and globalization, 1: 190, 191, 197	Inertia, excess, 1:305
and high technology entrepreneurship, 1: 32, 36	Inexplicable response, as intercultural error, 2: 250
immigrant entrepreneurs from, 2:150	Influencing others, 2: 243
and management, 1:196	Informal boundaries, 1:3
and organizational crisis management, 1: 109	Informal entrepreneurial processes, 1: 15
outsourcing to, 1: 356, 358–363, 445, 449	Informal planning, in young SMEs, 1:77–78
perceived fairness in, 1: 225	Information, organizational structures and acquiring/inter-
power distance in, 1:224	preting, 1: 477
talent supply in, 1:231	Information Age, 1: 84
and women entrepreneurs, 1:53	Informational justice, 1: 223, 227, 2: 384
Indian Ocean Tsunami, 2:2	Information and communication technology (ICT), 1: 432
Indigenous peoples, 2:253	Information asymmetry (information impactedness),
Indirect network effects, 1:303, 341	1:337
Individual, 2:110	Information asymmetry dilemma
Individual(s), 2: 111, 113	and globalization, 2:9
and conflict management, 2:45	and virtual work teams, 2: 11
and corporate entrepreneurship, 1: 13–14	and work teams, 2:6–7
global mind-set in, 1:187–188	Information-based imitation, 1: 400–405
and organizational security, 1:504	Information cascades, 1:400–401, 405
and workaholism, 1:154	Information disclosure programs, 1:265
Individual career management, 2: 111	Information environments, in supply-chain management,
Individual calcer management, 2:111 Individual-collective dimension, 2:314	1:414–415
Individual creativity, 2: 451–452	Information gathering, 2: 113–114
morridual cicativity, wets i ts2	intornation gamering, 2.113-117

Information integration, in supply-chain integration,	Institutional collectivism, 1:380
1: 436	Institutional isomorphism, 1:401–402
Information overload, and office design, 1:454	Institutional theory, and transfer of HRM best practices, 1:212
Information privacy, 2:380–389. See also Personal	Insurance, and illness prevention, 2:105
Web use monitoring	Insurance premiums, 2:104
at Hewlett-Packard, 2: 383, 386–388	Insurgency, as political tactic, 2: 213
managerial framework for, 2:383–388	Intangible capital, 2:401–409
managerial implication of, 2:388	collaborative capital, 2: 405
trends in, 2: 381–383	forms of, 2: 402
Information pump, 2: 19	human capital, 2:404
Information search phase, in decision process, 1: 299	intellectual capital, 2: 402–403
Information security, and teleworking, 2: 366	organizational capital, 2: 403–404
Information system/information technology (IS/IT) infra-	payoffs of, 2: 408–409
structures, 1:313	product development and deficiencies in, 2: 405,
Information systems	407–408
and organizational security, 1: 506	social capital, 2: 404–405
and organizational structures, 1: 473–474	for successful product development, 2: 405, 406
sustainability in, 1:257–258	Integral metaparadigm, 2:320
Information technology (IT), 2: 411	Integral Methodological Pluralism (IMP), 2: 319–320
business process outsourcing of, 1:446	Integrating plurality, 2:311–321
and global projects, 1:485	and developmental stages, 2: 317–319
and office design, 1:458–459	and fragmentation of organizational practice, 2: 312–313
outsourcing of, 1:446	framework for, 2: 314–316
Information work, 1:453	methodological implications, 2:319–320
Infosys, 1: 361	theoretical considerations in, 2: 319–320
Inglis, L., 2: 488	and theories of organizational/leadership practice,
In-groups, 2:4 5, 218	2:316–317
Initial public offerings (IPOs)	of theory and research, 2: 313–314
and entrepreneurship, 1: 43	Integration strategy, and organizational structure, 1: 476
and high technology entrepreneurship, 1: 39–40	Integrity, and organizational security, 1:501
Initiative, demonstrating, 2: 243	Integrity testing, 2:382
Inkpen, A. C., 1: 330	Intel Corporation, 1:230, 231
Inkson, K., 2: 111, 114, 118	and co-opetition, 1: 391
Inkson, Kerr, 2: 111, 114, 118	open office at, 2:373
Innocuous start, as intercultural error, 2: 250	organizational structure of, 1: 477
Innovation, 1:13	and supply-chain management, 1: 416
and artistic methods, 1: 490	Intellectual capital, 2:402–403
in Asia, 1: 231, 237–238	in customer value development, 2: 403
challengers vs. incumbents in network, 1: 307–311	deficiencies in, 2:407
climate for, 2: 457–458	payoffs of, 2:408
collaborative. See Collaborative innovation	in successful product development, 2: 406
and creativity, 2:450. See also Creativity	Intellectual capital accounts, 2:409
defined, 2:4 51	Intellectual property, 1:36
future directions for managing, 2:4 59	and entrepreneurship, 1:45
incompatible, 1:309–310	and incompatible innovation, 1: 309
management practices stimulating, 2: 458	and outsourcing, 1:448
in network markets, 1: 307–311	protection of, 1: 44–45, 309
obstacles to, 2: 455–456	Intellectuals, as change agents, 2: 431–432
organizational strategies for, 2: 458–459	Intelligence
radical, 1:310–311	cultural, 1: 184, 2: 328
types of, 1:308	human intellectual capital, 1:85
in United States, 1: 35–37	Intelligent career, 2: 123
Innovativeness, 1:17	Intelligent Career Card Sort (ICCS) Instrument, 2:114
Innovative strategies, and organizational structures, 1: 476	Intelligent careers, 2: 123
Instant office, 2: 355	Intentionality, and organizational emergence, 1:3, 4
Institute for Supply Management, 1:122	Intentions, of corporate entrepreneurship, 1:13
montate for supply management, 1.122	morning, or corporate entrepreneurship, 1.13

Interaction	Internal rents, 1:329
face-to-face, 2: 282–283	Internal Revenue Code, 2:108
by global sales force, 2:349	Internal Revenue Service (IRS), 2:372–373
interpersonal, 2:194	Internal threats
and mass customization, 1:423	and organizational security, 1:504
in virtual environments, 2:17	to organizational security, 1:502
Interactional justice, 1:223, 227	International Business Machines (IBM), 1:224, 356, 358,
Interconnected firms, 1:324–333	2: 24, 57, 393
competitive advantage of, 1:326, 329	and co-opetition, 1:391
configuration of, 1: 326–327	cultural analysis for, 1:379
discussion of proposed framework for, 1:331–333	and globalization, 1:178
emergence of, 1: 325–327	high technology entrepreneurship at, 1:33
and rent compositions, 1:329–331	and multilateral alliances, 1:341
resource-based theory of, 1:328–331	and open standards, 1:307
theories of, 1: 327–331	and RFIDs, 1: 438
Intercultural adaptation, 2:253–255	and supply-chain management, 1:416
Intercultural communication, 2:249–250, 255–258	and telework, 2:364
and behavior, 2:256	International career management, 2:117
caveats for, 2:258	International Data Corporation (IDC), 2:391
and cultures, 2: 250–251	International growth, and organizational structures,
errors in, 2: 249–250, 256–257	1: 476–477
foreign language instruction, 2:255–256	Internationalists, 2:327
guidelines for, 2: 257–258	Internationalization of Web sites, 2:396–397
and host cultures, 2:256	International Labor Office (ILO)
by individuals, 2:250	and corporate social responsibility, 1:97
and miscommunication, 2:249–250	and poverty, 1:97
by organizations, 2:250	International management, global management vs., 2:326
and overseas experience, 2:257	International Monetary Fund (IMF), 1:97, 217
training in, 2: 255–258	International organizational forms, 2:325
Intercultural errors, 2: 250	International political economy, and terrorism, 1:204–205
Intercultural morality, 2:258	International Standards Organization, 1:305, 464
Intercultural safety, 2: 258	International Steel Group, 1:174
Interdependence	Internet
and artistic methods, 1:494	and business imitation, 1:399
of work teams, 2:3	and entrepreneurship, 1:44
Interest asymmetry dilemma, 2:7, 9	and ERPII, 1: 440
Interest-based bargaining, 1:174	and global projects, 1:485
Interest groups, 1:128	and IIOS, 1: 319
Interfirm arrangements, and terrorism, 1:202–204	multilingual issues with. See Multilingual issues in
Interfirm co-opetition, 1:392, 393	global e-commerce Web sites
Intergroup Behavior (Turner and Giles), 2:329	and organizational security, 1:500, 501, 504, 505
Interior-exterior dimension, 2: 314	and supply-chain management, 1:409, 412, 414
Internal functional flexibility, 2:95–97	virtual environments, 2:17
Internal intrinsic opportunities, 2: 195	Internet-based interorganizational systems (IIOS),
Internalization, 2:337	1: 313–320
Internal labor markets (ILM), 2:115, 121	defined, 1: 314
Internal numerical flexibility	environmental factors affecting, 1:316–317
consequences for, 2:95	integrative framework for, 1:317–319
perspectives on, 2:94–95	organizational factors affecting, 1:316
Internal operations	planning for, 1: 314–317
and entrepreneur resilience, 1:67	practical implications of, 1: 319
RFID in, 2:415	research implications of, 1: 319–320
Internal pressures, for organizational misbehavior,	technological factors affecting, 1:316
2: 222–223	Internet-based KMS, 2:341–343
Internal rate of return (IRR), and organizational memory,	Internet bubble, 1:399, 401, 402, 405
2: 463	Internet monitoring, 2:381

Interorganizational co-opetition, 1:392 Interorganizational networks, 2:291–299	Iran, 1: 145 Ireland
defining, 2: 292	and development, 1:191
evaluating, 2:294	and high technology entrepreneurship, 1:32
leadership of, 2: 296–299	and women entrepreneurs, 1:53, 55
management of, 2: 295–296	Iridium Project, 1:485
markets and hierarchies vs., 2:292–293	ISO 1400 environmental management, 1:257, 282, 285,
and network process, 2:294–295	286
rationale for, 2: 293–294	ISO 9000 standard, 1:465
types of, 2: 293	ISO 14000 standard, 1:465
Interpersonal interaction, as intrinsic motivation, 2: 194	ISO 26000 standard, 1:464
Interpersonal justice, 1:223, 2:384	Isolating mechanisms, 1:327, 331
Interpersonally oriented style, 1: 160	Isolation, aboriginal, 2: 253
Interruptions, unplanned, 2:365, 368	Isolation, and teleworking, 2: 368
InterTran, 2: 396	Isomorphism, 1:401–402
Interventions, for organizational misbehavior, 2: 227–229	Israel
Intranets, 1:505	and development, 1: 191
Intrapersonal conflicts, 2:205	and global business citizenship, 1:145
Intrinsic motivation, 2:208, 385, 452	immigrant entrepreneurs from, 2:150
Intrinsic motivation, in public organizations,	power distance in, 1: 224
2:193–201	ITAC, 2: 359
and age, 2: 197–198	Italian, as Internet language, 2: 392
and attitudes of employees, 2: 196	Italy
and behavior of employees, 2:1 96–197	and development, 1: 191
comparative research on, 2: 197	fashion industry in, 1: 485
•	masculine/feminine roles in society, 1: 224
and education level, 2:198	
effects of, 2:196–197	and September 11, 2001, terrorist attacks, 1: 204
and ethnicity, 2:198	and women entrepreneurs, 1:53
future research, directions for, 2: 199–200	IT-based standards, 1:436
and gender, 2:198	Iterative work
interpersonal interaction as, 2:194	and artistic methods, 1:494–495
at management level, 2:199	in artistic methods, 1:494–495
need-based perspective for, 2:195	Ito, J. K., 2:116
need for growth as, 2: 194–195	IT outsourcing, 1:356–358
preferences for, 2:197–199	benefits from, 1: 356–357
and public-service motivation, 2: 199	economic gains from, 1:357–358
and race, 2: 198	to India, 1:358–362
recommendations for, 2:200	motivations for, 1:357
self-determination as, 2: 194	iTunes, 1: 37, 305
and socialization experiences, 2:199	I2, supply-chain management software from, 1: 414
source-based perspectives for, 2:195–196	iVillage.com, 2:18
sources of, 2: 195–196	
stimulation as, 2:194	Jackall, R., 2: 66
and work experience in public sector, 2: 198–199	Jackson, Jesse, 1:172
Intuition, 1:298	Jackson, S. E., 2: 56
Invasions of privacy, 2:384	Jackson State University, 1:108
Inventory	Jacobson, L., 2: 305
and RFIDs, 1: 438	Jacoby, S. M., 2: 67
in supply-chain management, 1: 410–411	James, Karli, 1:121
Inventory-based production, and mass customization,	Jamming, culture, 1:131–132
1:428	Janis, I. L., 2: 473
Investment, in employee development, 1:215–217	Janis, Irving, 1: 110
"Invisible hand," 1:88	Japan, 2:115
Involvement, as creativity/innovation dimension, 2:457	Asian colonization/occupation by, 1:214
iPhone, 1: 33, 37	atom bombing of, 1:484
iPod, 1:37, 303, 305, 306	and business imitation, 1:399-400, 404
IQ, 2: 318	and co-opetition, 1:391

co-opetition in, 1: 387	JP Morgan Chase, 1: 108, 381
and culture, 1:380	Juday, T. R., 2: 107
and development, 1:191	Justice climate, 2:384–385
diversity in, 2:148	Justice perception, 2:84
and entrepreneurship, 1:42	Justice research
and ethical manufacturing, 1:468	cross-cultural, 1:225–226
high technology entrepreneurship in, 1:34	organizational, 1:223
HRM practices in, 1:215	Just-in-time (JIT), 1:285
language issues in, 1:243	
lifetime employment in, 1: 217	Kaeufer, K., 2:39
manufacturing in, 1:232	Kagermann, Henning, 1:386
masculine/feminine roles in society, 1:224	Kahneman, D., 1:350, 351
middle management changes in, 2:68–73	Kaleidoscope career model (KCM), 2:126–127
as model for best practices, 1:211	Kalev, Alexandra, 2:147
and natural disasters, 1:201	Kalleberg, A. L., 2: 97
new economy, managing in, 2:65–73	Kalundborg, 1:256
perceived fairness in, 1:225	Kaminski, M., 2: 60
performance-based rewards in, 1: 217	Kandola, Rajvinder, 2:143
quality revolution in, 1: 466	Kanter, Rosabeth Moss, 1:277, 278, 364, 2:66, 234,
R&D spending in, 1:231	296, 328
restructuring in, 2:66–68	Kao, J., 2: 516
and September 11, 2001, terrorist attacks, 1:204	Karayilanoglu, T., 2:494
and strategic alliances, 1: 340	Karoshi, 1:152
uncertainty avoidance in, 1:224	Kastelle, T., 1: 203
and workaholism, 1:152	Katz, M., 1:304, 306, 308
Japanese, as Internet language, 2:392	Katz and Gartner framework (for organizational emer-
Jarvenpaa, S. L., 2: 38, 46	gence), 1: 2–3
Jeannet, JP., 1: 181	Kearns, G. S., 1: 318
Jehn, K., 2: 45, 52	Keck, M., 1:128
Jennings, Marianne M., 1:120, 122, 123	Kedia, B. L., 1:181, 182
Job Action Sheet (JAS), 2:496	Kefalas, A., 1:181
Job characteristics, 2:134	Kehr, H. M., 2: 203, 205–209
Job design, 2: 223	Keiretsu, 1:34, 2:67, 69
Job enrichment, 2: 440	Kelly, Erin, 2:147
Job insecurity, 2:134	Kenar, L., 2: 494
Job performance, and emotion, 2:264	Kennedy, John F., 1:111
Job postings, 2:116	Kenya, 1: 124
Job rotation, 2:116	Key performance indicators (KPI), 1:448
Job satisfaction, 2:134	Keyworth, George, 2:388
of mid- and late careers, 2:134	KFC, 1:476
and telework, 2:362	Khandelwal, V. K., 1: 316
and teleworking, 2:367	Kielser, S., 2:38
Job sharing, 2: 136, 174–175	Kikkoman, 1:236
Job stressors, 2:134	Kim, J, E., 2: 136
John Hopkins University, 1:108	Kim, J. W., 2:38, 46
Johnson, Lyndon B., 2:141	Kimberley Process, 1:462
Johnson & Johnson, 1:238, 2:104, 107	King, B. G., 1: 132
culture-sensitive global strategy of, 1:383	King, W. R., 1: 320
and supply-chain management, 1: 412	Kipling, Rudyard, 1:221
Joint Commission for Accreditation of Healthcare Organi-	Kipnis, David, 2:213
zations (JCAHO), 2: 492, 495, 496, 497, 498	Kirkman, B. L., 2: 37
Joint-stock firms, 1:348	Kirton Adaptor Innovator (KAI), 2:455
Joint ventures, 1: 387–389	Kirzner, Israel, 1: 23
Jollibee, 1:236	Klaas, B., 2:5 9
Jones, G. R., 1:314	Klaas, B. S., 2: 59, 61, 89
Jordan, Ann, 2: 143	Klein, G. A., 2: 474
Joshi, A., 2:39	Klijn, EH., 2: 295, 299

Knight, G. A., 1: 206	Kogut, B., 2: 36
Knight, Philip, 2: 392	Kolb, Harry, 2: 446
Knoke, D., 2: 293	Kone Corporation, 1:240, 244, 245
Knowing-how, 2:114	Konrad, Alison, 2:146
Knowing-whom, 2:114	Koppenjan, J. F. M., 2:295, 299
Knowing-why, 2:114	Korea. See South Korea
Knowledge, 2:336–338, 403. See also specific types, e.g.:	Korean, as Internet language, 2:392
Customer knowledge	Kosier, D., 2: 104
for creative foundations, 2:515	Kossek, E. E., 2:104
designing to unlock, 1: 453	Kotler, P., 2:18
Knowledge acquisition	Kotter, John, 1:276-279, 2:278-279
and entrepreneur resilience, 1:66	Kottke, Janet, 2:143
in transnational teams, 2: 40–41	Kraan, K. O., 2:97
Knowledge application map, 2:343	Krackhardt, D., 2:240
Knowledge asset map, 2:343	Kraemer, K. L., 1:314
Knowledge-based economies, 2: 131	Kram, K. E., 2:117
Knowledge creation, 1: 336	Kramer, M. W., 2:246
Knowledge development map, 2:343	Kramer, R. M., 2:234, 235, 236
Knowledge-enabled CRM (KCRM), 2: 343–344	Krugman, Paul, 1:377
"Knowledge import," collaborative innovation vs., 2: 17	Kuklinski, J., 2: 293
Knowledge-intensive organizations, transnational teams	Kumaraswamy, A., 1:307
in. See Transnational teams, in knowledge-	Kumpe, T., 2: 93
intensive organizations	Kunda, G., 2: 99
Knowledge management (KM), 2:336–345. See also	Kuwait, 1: 380
Organizational memory	110 (110)
advanced technologies for, 2: 344–345	Labeling
concepts in, 2:338	and poverty, 1: 99
and co-opetition, 1: 395	and poverty alleviation, 1: 99
enterprise systems support for KMS, 2: 343–344	Labor
Internet-based KMS, 2:341–343	demand for, 2:135
knowledge in, 2: 336–338	and ethical manufacturing, 1: 465
knowledge management systems, 2: 339–340	flexible. See Flexible labor
knowledge repositories, 2: 339–340	future of, 1: 171–172
and organizational learning, 2: 338–339	mid- and late careers, 2:135
and organizational memory, 2: 339	Labor relations, 1:167–175
success in, 2: 340–341	and bargaining process/issues, 1: 174
and sustainability, 1: 290	characteristics of American, 1: 167–168
Knowledge management systems (KMS), 2: 336–345,	and conflict/strikes/pressure tactics, 1: 175
339–340	and demographic changes, 1: 170
enterprise systems support for, 2: 343–344	and employee benefits, 1: 171
Internet-based KMS, 2:341–343	and employer relations, 1:174–175
Knowledge maps, 2:345	and employment structure, 1:170
Knowledge portals, 2: 341–343	and globalization, 1: 169–170, 173–174
Knowledge process outsourcing (KPO), 1: 363, 446	and income, 1: 171
Knowledge sharing, 1:393	and industry structure, 1: 170
KnowledgeSpace, 2: 342	trends affecting future of, 1: 169–171
Knowledge spectrum, 2: 339	in 20th century, 1: 169
Knowledge structure map, 2: 343	in 21st century, 1:169
Knowledge transfer, 2:336–337	in 2025, 1: 171–175
Knowledge work, 2:402	and unions, 1: 168, 172–173
and artistic methods, 1: 490	Lactation rooms, 2:177
	Lactation 100ms, 2:177 LaFleur, S. J., 1: 162
and office design, 1:452	
Knowledge workers, 1:491	Lagadec, Patrick, 1:113
Kobrin, S. J., 1: 180	Lag relative wage strategy, 2:88–89
Kochan, T. A., 2: 61	Laissez faire leadership, 1: 160
Kodak, 1:383, 2:4, 57	Lake, G., 2: 63

Landfill disposal, 1:466	and followers, 2:275
Land's End, 1: 421, 423	and globalization, 2:275–276
Lane, H. W., 1: 180	implicit leadership theories, 2: 301–309
Langlois, R., 1:202	integral framework for. See Integrating plurality
Language, and intercultural adaptation, 2:2 54	of interorganizational networks, 2: 296–299
Language-based communication networks, 1:244	and leader-follower exchange, 2: 275
Language issues, 1:240–247	models for, 2: 273–276
and careers, 1: 243–244	for organizational challenges, 2: 272–273
with communication networks, 1: 244	for organizational change, 2: 276–279
diversity in multinational corporations, 1: 242–243	and outsourcing, 1: 449
with English language, 1:241–242	and personal characteristics, 2: 273–274
with foreign subsidiaries, 1:244–245	remote. See Remote leadership
future research, directions for, 1: 246	and sustainability, 1:255
with translators, 1:245–246	Leadership buy-in, 2: 106
Language nodes, 1:244	Leadership development, in global management, 2:332
Larkin Building (Buffalo, New York), 1: 452, 453	Leadership sharing (LS) networks, 2: 241–242
Larson, C. E., 2: 296	advantage of, 2:245
Laschever, S., 1:159	employee characteristics for, 2: 242–244
Lash, S., 1:205	fears in, 2: 246
LASIK, 1: 40	follower's strategies in, 2: 242
Late careers. See Mid- and late careers	and growth need interview, 2: 244–245
Late movers, and business imitation, 1:402	resources supplied by, 2:242
Latham, Gary, 2:183	strategies for, 2: 245–246
Lau, D. C., 2: 45	supervisor strategies in, 2: 241–242
Laurie, D. L., 2: 296	Leadership style, of women management, 1: 159–160
Law, and intercultural adaptation, 2: 254	Lead relative wage strategy, 2:87–88
Lawler, E. E., III, 2: 58	Lean supply chains, 1: 410
Lawler, Edward, 2:2 12	Learning
Lawson, R., 1:194	in development alliances, 1:338
Lawsuits, and human resources management, 2:61	in GBC implementation, 1: 146
Lay, Kenneth, 1:108	Learning by doing, 1:338
Layoffs, and business imitation, 1:404	Learning organizations, 2: 142
Lazear, E. P., 2:88	Learning to learn, 2:328
Lazonick, W., 2: 66, 67	Leat, D., 2: 510
LCD technology, 1:394, 395, 396	Lebanon, 2: 150
LDCs (underdeveloped countries, less developed coun-	Lederer, A. L., 1: 318
tries, third world countries)	Lee, C. S., 1:318
and globalization, 1:191, 196	Lee, HK., 2: 488
Leader-follower exchange, 2: 275	Legal constraints, with multilingual e-commerce Web
Leader-nonlower exchanges, 2.275 Leader-member exchanges (LMXs), 1:223, 2:275, 296	sites, 2:395
Leader-inemoer exchanges (Livixs), 1.223, 2.273, 290 Leadership, 2:272–280	Legal reporting requirement, 2:108
across cultures, 2:275–276	Legislation
alternate models for, 2:273–276	and environmentalism, 1:272–274
alternative approaches to, 2:275–276	and environmental supply chain management, 1: 289
	11.
approaches to, 2: 276–279	and ethical manufacturing, 1: 468
in arts management, 2:485–486	Legitimation
and behavior, 2: 274–275	and business imitation, 1:402
behavior of, 2: 274–275	and death rates of new firms, 1:34
crisis of, 1:109	Leidner, D. E., 2:38
and culture-sensitive global strategies, 1:383	Leifer, E., 1:390
democratic, 1:160	Leno, Jay, 1:111
in developing countries, 1:195	Lenovo, 1:241
development of, 2:265–266	Lenox, M. J., 1:128, 134
and emotion, 2: 264, 265–266	Lent, R. W., 2:112
in environmental concerns, 1:277–278	Lenway, S. A., 1: 181
exercising, 2: 243	Lenz, J. G., 2: 112, 113, 118

Leonard, B. D., 2:15	Logistics
Less developed countries. See LDCs	business process outsourcing of, 1:446
Letourneux, V., 2:98	inbound, 1: 285–286
Leveraging experience, of alliances, 1: 339–340	outbound, 1: 287–288
Leveson, N., 2: 473	reverse, 1:121, 288–289
Leviatan, U., 2: 301	in supply-chain management, 1:413-414
Levine, D. I., 2: 62	sustainability in, 1: 257
Levine, James, 2:487	Logistics social responsibility (LSR), 1:119–121, 120
Levinson, D. J., 2: 131	environmental, 1: 121
Levi Strauss & Company, Inc., 1:145, 410, 427	ethics in, 1: 120
Levy, O., 1: 182–185, 188	London, England, 2:125
Lewin, D., 2: 57, 58, 59, 60, 61, 62	London Imaginarium, 1:454
Lewin, Kurt, 2: 143, 205, 217, 354–355, 431, 439,	Long-term orientation, 1: 379
440, 446	Lord, C. G., 2: 234
Lewis, Suzan, 2: 82–83, 83	Lording game, 2:214
LG Electronics, 1: 362, 384, 389	Lord of the Rings (film trilogy), 1:485
Liabilities of newness, 1:12	Losey, M. R., 2:63
Liability of age, 1:12	Lovas, B., 2: 40
Liability of newness, 1:34	Low-cost countries (LCCs), 1:417
Liaison structures and processes, 1:475	Low frequency (LF), 2:413, 414
Liebowitz, S. J., 1: 307	Lowndes, V., 2: 293
Liesch, P. W., 1:203, 206	Low-trust societies, 1:377
Life cycle analysis (LCA), 1: 282, 285, 287, 289, 290,	LP vinyl records, 1:305
462, 463	LSR (logistics social responsibility), 1:120
Life Cycle Assessment, 1:119	Luxembourg, 1:191
Life expectancy, 2:160	-
Life Science, 1:381	MacDuffie, J. P., 2:67
Lifespan development model, 2:131	Machine translation (MT) of languages, 2:396
Lifestyle, as career anchor, 2:127	Machine translators, 1:245–246
"Lifetime employment," 2: 115	"Macho culture," 1:161
Lifetime employment (LTE), 2:67	Mackenzie Davey, K., 2:111
Light, Paul, 1:24	Made-to-stock production, 1:428
Lincoln Plating, 2:107	Madison, James, 1:87, 88
Lindell, M., 2: 494	Mael, Fred, 2:184
Line vs. staff game, 2:214	Mahony, D., 2:59, 61
Lingo Systems, 2:397	Maignan, Isabelle, 1:121
Linguistic cultural change, 2:251	Mainiero, L. A., 2:126, 127
Linguistic style, and women managers' success, 1:159	Maintenance employees, mobile, 2:349–350
Linux, 1: 310	Make of buy decision, 2:115–116
Lipsky, D. B., 2: 60	Makers, 1: 493
Little, Arthur D., 1:254	Malaysia
Littler, C. R., 2: 67	economic reforms in, 1: 212
LIUNA (Laborers Union), 1:169	foreign impact in, 1:214
Local area networks (LANs), 1:505	HRM practices in, 1:215
Local citizen, 1: 140, 141	lifetime employment in, 1:217
Local exchange trade (LET), 1:133, 134	manufacturing in, 1:230, 232
Local implementation, of global business citizenship,	power distance in, 1:224
1: 145	state intervention in, 1:214, 218
Location, in supply-chain management, 1: 413	Malmendier, U., 1:349
Locke, John, 1:88	Mamic, Ivanka, 1:97
Locked in design, 1:305	Managed market theory, 1:365
Lockheed-Martin, 2:4	Management
Lockyer, Bill, 2: 386, 387, 389	of business process outsourcing, 1:447–449
Loeber, C. C., 1: 162	in developing countries, 1:194–196
LogicaCMG, 1:358	and environmental compliance, 1:268–269
"Logic of organizing," 1: 482	global mind-set and effective, 1:183–184

sustainability in, 1: 257–258 and terrorism, 1: 201–202, 206–207	Market segment, and mass customization, 1: 425 Marks, Stephen R., 2: 79
women, 1:163	Marks and Spencer (M&S), 1:468
and workaholism, 1: 154–155	Marshall, P., 1: 317, 318
Management buy-in, for organizational security, 1: 508	Marshall Plan, 1:484
Management by Objectives (MbO), 2:203	Martin, R., 2:307
Management capacity, and entrepreneur resilience, 1: 67	Marx, Karl, 2: 431
Management education, and women managers' success, 1:163	Masculinity and culture, 1:379
Management level, intrinsic motivation at, 2: 199	and fairness perceptions, 1: 224
Management of information systems, and organization	Maslow, Abraham, 2: 193, 194, 216, 436, 446
memory, 2: 463 Management practices, in arts management, 2: 483	Massachusetts Institute of Technology (MIT), 2:411, 412, 446
Management structure, of entrepreneurial firms, 1:16	Mass consumption society, 1: 421
Management support processes, organizational security	Mass customization, 1:420–428
in, 1:506	and codesign by customer, 1:424–425
Management systems, and corporate social responsibility,	and customer orientation/centricity, 1: 421–422
1: 118–119	and custom products for individual needs, 1:423–424
Managerial competencies, as career anchor, 2:127	defined, 1: 422–423
Managerial Grid, 2:439	elements of, 1: 423–427
Managerial misclassification, 2:6 2–63	future research, directions for, 1:427–428
Managers	and price/costs, 1: 425–426
as change agents, 2: 430	and stable solution space, 1:426–427
creativity of, 1: 496	and supply-chain management, 1:414
Managers of discontent, 1:168	Mass production, 1:421, 427
Managing Across Borders (Bartlett and Ghoshal),	Match relative wage strategy, 2:88–89
2: 35, 324	Material culture, 2:255
Managing the Unexpected (Weick and Sutcliffe), 2:476	Materialization, as culture division, 2:251
Mandatory subjects of bargaining, 2:108	Material requirements planning (MRP), 1:433
Manhattan Project, 1:484	Materials, and artistic methods, 1:493
Man-Made Disasters (Turner), 2:473	Maternity leave, 1:55
Mann Gulch wildfire disaster, 2: 474	Mathematical optimization, 1:413
Mannix, E. A., 2: 38	Matsushita Electric, 1:102
Manufactured capital, and ethical manufacturing,	Mattel, 2: 20
1: 466	Maturity, and adult development, 2:162–163
Manufacturer price variations, 1: 412	Mayes, Bronston, 2:212
Manufacturing	Maznevski, M., 2:38
ethical. See Ethical manufacturing	Maznevski, M. L., 1: 180
and labor relations, 1:170	McCall, M., 1:187
outsourcing of, 1:362	McClendon, J. A., 2:89
Manufacturing resource planning (MRPII), 1: 433	McDonald Douglas, 2:408
Manugistics, 1:414	McDonald's, 1: 236, 476, 2: 30, 393
Maple Grove, Minnesota, 2:106	McEvily, B., 2: 39
Marais, K., 2: 473, 477	McGrath, J., 2:25
March, James G., 1:486	McGrath, J. E., 2:4
Margolis, S. E., 1:307	McGregor, Douglas, 2:446
Mariner Energy Incorporated, 1:108	McGuire, M., 2: 295, 297
Market entry, 1: 399 Marketing	Mckay, J., 1: 317, 318 McKinsey, 1: 78, 2: 446, 448
in arts management, 2: 488	McMahan, G. C., 2: 87
and supply-chain management, 1: 409	Means, G. C., 1: 348
in supply-chain management, 1:411–412	Mechanistic coordination, 2:29–30
sustainability in, 1:258–259	Mediation, as intercultural guideline, 2: 257–258
Market orientation, and mass customization, 1: 421	Medical and Health Incident Management System
Market overlap, and business imitation, 1:421	(MaHIM), 2: 495
Marketplace, activist tactics in, 1:131	Medical conditions, 2:103
r,	

Medicare, 2:136	and organizational security, 1:504, 505
MedlinePlus.com, 2:18	and supply-chain management, 1:416
MedUnite, co-opetition in, 1: 384	Microsoft Outlook, 1:306
Meeting rooms, 1: 453, 454, 456	Mid- and late careers, 2:130–138
Meindl, J. R., 2: 303–304	and aging, 2: 132–133
Meindl, James, 2:302	applications for, 2:136
Meir, E. I., 2: 113	and cognitive aging, 2:132–133
Memory, organizational. See Organizational memory	and demand for labor, 2:135
Memory, self-, 2: 340	and downsizings, 2:135
Men and Women of the Corporation (Kanter), 2:66	and experience, 2:133
Mendenhall, M. E., 2: 117	and expertise, 2:133
Men's careers, 2: 113	future research, directions for, 2:136
Mental health, 2:108	implication of, 2:136
Mentor development, as career strategy, 2:125	individual-level factors affecting, 2:132–133
Mentoring	issues of, 2: 132–135
for diversity, 2:145	job characteristics for, 2:134
and women management, 1:161	job-level factors affecting, 2:133–134
Mentoring programs, 2: 145	job satisfaction of, 2:134
Mentors	and organizational climate, 2:135
as change agents, 2: 432–433	organizational-level factors affecting, 2:134–135
and women managers' success, 1:161	and physical aging, 2:132
Mentorship, 2:117	and retirement, transition to, 2:135–136
and career management, 2:117	stressors for, 2:134
and entrepreneur resilience, 1:67	and work-family balance, 2:133
Mercantilism, 1:47	Middle managers, 2:68–73
Merger paradox, 1:345–353	Middleman minority, 2:152
agency theory of, 1: 348–349	Miglani, Anil, 1:111
defined, 1:345	Military, and culture-sensitive strategy, 1:376–377
herding model of, 1:350	Milkovich, G. T., 2:91
hubris theory of, 1: 349	Millenials, 2:162
minimax-regret framework of, 1:351	Millenium Project, 1:98
regret framework of, 1:350–351	Millennium Development Goals (MDGs), 1:97, 98
reputation theory of, 1:349–350	Millennium Ecosystem Assessment, 1:25–253
research on, 1:345	Miller, Danny, 1:111
Mergers	Miller, Norman, 2:142
cultural considerations with international, 1:382–383	Miller Brewing Company, 2:4
and culture-sensitive global strategy, 1:383	Mills, C. W., 2: 66
and real value, 1: 346–347	Mimetic isomorphism, 1:401–402
restructuring wave stages in, 1:352	Mindfulness, 2: 476, 477
and shareholder value, 1:347–348	Mind-set. See also Global mind-set
waves/performance of, 1:346–348	concept of, 1: 179–180
Metallurgical technology, 2: 252	and co-opetition, 1:396
Metcalfe's law, 2:17	and mass customization, 1:427–428
"Me-too" strategies, decay of, 1:233–234	and office design, 1:453
Metrics, in supply-chain management, 1:415–416	Minimalism, 1:142
Metropolitan Opera (New York City), 2:487	Minimalist citizenship, 1:141–142
Mexico	Minimax regret, 1:351
and labor relations, 1:169–170	Minorities
power distance in, 1:224	advancement of, 2: 147–148
Meyer, J. P., 2: 114	and diversity management, 2:147–148
Meyer, John, 2: 186	in management, 2: 147–148
Microcredits, 1:100	Minority entrepreneurship. See Ethnic minority
Microfinancing, 1:103	entrepreneurship
Microsoft, 1:447, 2:24, 403	Minority-/women-owned business enterprise (MWBE)
co-opetition in, 1:384	and corporate social responsibility, 1:124-125
and network markets, 1:304, 306-308, 310	in supply chain, 1: 124–125
and organizational memory, 2:469	Mintzberg, Henry, 1:311, 377, 2:212, 213–214

Mirvis, P. H., 2: 130	Motivating individuals and groups at work in the 21st
Misbehavior. See Organizational misbehavior	century, 2:182–192
Miscommunication, intercultural, 2:249–250, 256–257	Motivation(s). See under Work motivation
Mission drift, 1:30	and electronic monitoring of Web use, 2:375
Mission statements, environmental concerns in, 1:277	and emotion, 2: 264–265
Mitchell, D. J. B., 2:57, 58	for environmental compliance, 1:267
Mitroff, Ian, 1:106, 108, 111, 114	intrinsic, 2: 385, 452
Mitsubishi Electric, 1:384	and self-set goals, 2:209–210
Mizrahi, T., 2:297	of women entrepreneurs, 1:54
Mobile and virtual work, 2:348–359. See also Telework	Motives, implicit vs. explicit, 2:206
benefits/drawbacks of, 2:356–358	Motorola, 1: 362, 2: 4, 107
distributed collaboration, 2:353–354	culture-sensitive global strategy of, 1:381
drivers of, 2: 350–351	and global projects, 1:485
embedded spaces, 2:354–356	Mount Everest tragedy (1996), 2:475
future developments for, 2: 359	Moussaui, Zacarias, 1:113
global sales forces, 2:348–349	Mouton, J. S., 2: 46
individual e-work, 2: 351–352	Mueller, D. C., 1: 347
managing workforce, 2:358–359	Multicultural workforce, 2:137
mobile maintenance employees, 2:349–350	Multidimensional perspectives, 1:180
multiple workplaces, 2:354	Multidirectional career, 2:125–126
and types of mobility, 2:351	Multidirectional careers, 2:125–126
Mobile technology, 2:350, 351	Multidivisional organizations, and business imitation,
Mobile workers, 2: 352	1: 400
Mobility	Multilateral alliances, 1:340–342
global sales force and, 2:349	Multilateral co-opetition, 1:392
perfect, 1:328	Multilingual issues in global e-commerce Web sites,
Mobilizing, as leadership activity, 2:298	2: 391–398
Model for Creating Diversity, 2: 143	approaches to, 2:393
Model for Work On Diversity, 2:142–143	and challenges for multilingual sites, 2:393–394
Moderator variables, in diversity management, 2:146	cultural preferences, 2:394
Modernist assumptions, 2:427	future trends, 2: 397–398
Modularity, 1:341	language barriers, 2:394
and global projects, 1:487	and languages used on Internet, 2:391–392
and mass customization, 1:427	legal constraints, 2:395
Moen, P., 2: 136	political factors, 2:394–395
Mohammed, S., 2:45, 51	solutions to challenges for, 2:395–397
Moldoveanu, M., 1:129	technical differences, 2:394
Momentum, excess, 1:305	technological difficulties, 2:394
Monasteries, 1:456	terminology related to, 2:395
Monetary rewards, 2:193, 196	and Web sites as marketing tools, 2:392
Monitoring of Web use at work. See Personal Web use	Multimarket contact theories, 1:402–403
monitoring	Multinational companies, 2:117
Monopolies, 1:306	Multinational companies (MNCs)
Monopolistic competition, 1: 423	Asian competition for, 1:236, 237–238
Monsanto, 1:33	Asian talent supply for, 1:231
Montgomery, Kendyl, 2:143	definitions of, 1:240
Moody's Investors Services, 1:108	India as manufacturing base for, 1:362
Morale, 2:104	overhead burden of, 1:234
of entrepreneurial team, 1:66–67	transfer of HRM best practices in, 1:212
and entrepreneur resilience, 1:66–67	Multinational corporations (MNCs)
and teleworking, 2:366	and globalization, 1:178–181, 184
Morality, intercultural, 2: 258	and terrorism, 1: 201
Moral Mazes (Jackall), 2:66	Multinational Enterprises (MNEs), 1:95
Morocco, 1: 380	Multinational firms
Mortensen, M., 2: 46, 48	alliances/mergers of, 1:382–383
Mosakowski, E., 2: 37	cultural predisposition of, 1:380–381
Moss, 2: 123	cultural sensitivity in policies of, 1:381–384

leadership as core competency of, 1:383	Neale, M. A., 2:38
and strategic management theory, 2: 35–37	Neale, Margaret, 2:146
subsidiaries of, 1:381–382	Nearshore, 1:446
Multinational organizational forms, 2:325	Nearshore outsourcing, 1: 446
Multiple workplaces, 2:354	Near-shoring, 1: 356
Murnighan, J. K., 2: 45	NEC, 1:384
Murphy, Paul R., 1: 119–121	Need for authenticity, 2: 126
Murray, Sarah, 1:113	Need for balance, 2:126
Murray, V., 2: 486	Need for challenge, 2:126
Murtha, T. P., 1: 181	Need for growth, 2: 194–195
11.10.10.00, 11.11, 11.10.1	Needs
Nagasaki, 1:484	career matching, 2: 121
Nalebuff, B. J., 1: 389, 390, 394	and intrinsic motivation, 2:195
Nambisan, S., 2:16	and self-set goals, 2:205–206
NASA. See National Aeronautics and Space	and sustainability, 1: 251
Administration	Needs assessment, for business process outsourcing,
Nascent entrepreneurs	1:448
behaviors/activities of, 1:5	Negative affect (NA), 2: 260–261, 264, 265
defined, 1:2	Negative rights, 1: 142
empirical research on, 1:3–5	Negotiation
PSED definition, 1:7	for business process outsourcing, 1: 448
and social capital, 1:4	and emotion, 2: 263–264
in start-up teams, 1:4–5	Negotiation team task, 2:25
Nascent Entrepreneurs (Davidsson), 1:7	Neolithic Period, 2: 251, 252–253
Nascent technologies, 1:37	Nepotism, 1: 195
National Academy of Sciences, 2: 382	Nestlé, 1: 131, 439, 2: 343
· · · · · · · · · · · · · · · · · · ·	
National Aeronautics and Space Administration (NASA), 1:36, 2:471, 473, 474, 478	Netflix, 1: 37 Netherlands, 2: 95, 97
and high technology entrepreneurship, 1: 36	Asian colonization/occupation by, 1: 214
and organizational crisis management, 1:108	and culture, 1:380
· · · · · · · · · · · · · · · · · · ·	
National Basketball Association (NBA), 2:5 02 National Career Development Association (NCDA),	and development, 1:191
2:112	multilingual capabilities in, 1:242
	perceived fairness in, 1:225 Network economics, 1:390
National Cooperative Research Act (NCRA), 1:391 National Day Laborer Organizing Network, 1:172	Network economics, 1.390 Network effects, 1:303, 341
National Education Association (NEA), 1:169	Network externalities theory, 1: 304
National Football League (NFL), 2:502	· · · · · · · · · · · · · · · · · · ·
	Networking, 2:145
National Guard, 2:2	for diversity management, 2:145
National Incident Management System (NIMS),	and women entrepreneurs, 1:55–56
2:495–496 Notional Institute for Occumational Sofety and Health	and women management, 1:161
National Institute for Occupational Safety and Health (NIOSH), 2:77, 492	Network markets, 1:303–311 challengers vs. incumbents in, 1:307–311
National Institute of Standards and Technology (NIST),	competition in, 1:306–307
1:36	coordination in, 1:305–307
National Institute on Drug Abuse, 2: 382	criticisms of, 1:307
Nationalist corporations, 1:381	emerging, 1: 306–307
National Labor Relations Act (NLRA), 1:167, 2:108	expectations/compatibility in, 1: 304–305
National Labor Relations Board (NLRB), 1:169	incompatible innovation in, 1: 309–310
National Minority Supplier Development Council, 2: 151	innovation in, 1: 307–310
National Nanotechnology Initiative, 1:36	and open standards, 1:307
National Preparedness Goal, 2:497	radical innovation in, 1: 310–311
National Security Agency (NSA), 2:382	research on, 1:304
National sporting organizations (NSOs), 2:503, 505	"winner-takes-all" competition in, 1:304
Natural capital, and ethical manufacturing, 1: 466	Network resources, in alliances, 1: 325
Natural disasters, and organizational security, 1:507	Networks
Natural environment, 1:271–272	of alliances, 1:342–343
Neal, M. B., 2: 133	building, 2: 243
1 10011 111 19 9 MO 1 0 0	Juliuli, 4. 2 iJ

interorganizational. <i>See</i> Interorganizational networks language-based communication, 1: 244	Nongovernmental sanctions, and environmental compliance, 1:264
and social entrepreneurship, 1:26–27	Nonprofit organizations
and women managers' success, 1:161	and entrepreneurial resilience, 1:68
Network theories, for ethnic minority entrepreneurship,	and entrepreneur resilience, 1:68
2: 152–153	Nonunion grievance systems, 2: 59–60
Network thresholds, 1: 309–310	Nonverbal cues, 2:283
Newbery, D. M. G., 1: 306	Normal Accidents (C. Perrow), 2:472
"The new careers," 2:118	Normal accident theory, 2: 472–473
New Deal, 2: 122	Normalization of deviance, 2:474
New economy, managing in, 1:54, 401, 2:65–73	Normandy Invasion, 1:484
changes in middle managers' work, 2: 71–73	Norm-gift exchange models, 2:88
downsizing and delayering, 2: 69–71	Nortel, 1:338, 2:409
human resource management in, 2: 71	North American Free Trade Agreement (NAFTA), 1:444
organizational boundary changes, 2:68–69	Northcraft, Gregory, 2:146
restructuring, literature on, 2: 66–68	Norway, 1: 165, 191
New Firm Creation in the U.S.: A PSED I Overview	Not-for-profit organizations, outsourcing by, 1: 444
(Reynolds), 1:7	Novelty, 1: 340
Newman, J. M., 2: 91	Numerical flexibility
Newness, liability of, 1: 34	external, 2: 97–99
New product and service development in strategic alli-	internal, 2: 94–95
ances, 1:335–343	Nummela, N., 1: 181
New product introduction, in supply-chain management,	Nye, J. L., 2: 304
1: 414	
New ventures, strategic planning in, 1:76	Obesity, 2: 103
New Zealand, 2:96	Objectives, in strategic planning, 1:77
and culture, 1:380	Object Naming Service (ONS), 2:414
and development, 1:191	Occupational Safety and Health Act of 1970, 2:60
diversity in, 2:148	Occupational Safety and Health Administration (OSHA),
and entrepreneurship, 1:46	2: 492, 495, 498–499
and global projects, 1:485	Office, definitions of, 1: 452
perceived fairness in, 1: 226	Office design, 1:451–459
power distance in, 1:224	bottom-up, 1: 452
sports organizations in, 2:503	controversies in, 1:453–454
telecommuters in, 2:175	for creativity, 1: 454
and women entrepreneurs, 1:53	and diversity, 1: 452–453
NGOs. See Nongovernmental organizations	drivers of, 1: 454–455
Niches, 1: 32	and fitness for purpose, 1:457–458
Nicholson, M., 2: 508	and flexibility, 1: 453
Nigeria, 1: 380	future directions for, 1:455–456
Nike, 1: 256, 2: 20, 392, 403	and IT, 1: 458–459
and activist groups, 1:127	and knowledge work, 1: 452
and corporate social responsibility, 1:118	and paperless office, 1:454
culture-sensitive global strategy of, 1:384	process of, 1:457
9/11 Commission Report, 1: 113	role model of, 1:456
Nissen, Richard, 1:457	of specialist spaces/facilities, 1:453
Nixon, Richard M., 1:273	system approach to, 1:455
Noer, D., 2: 66	and unlocking knowledge, 1:453
Nohria, N., 2:35	and walls, 1: 454
Nokia, 1: 362	Office space
Noncore activities, 1: 444, 447	companies without, 1: 456–457
Nondisclosure agreements, 2:380	and teleworking, 2:366
Nonfinancial reports, and corporate social responsibility,	and "third spaces," 1:456
1:117–118	Offshore outsourcing, 1:446
Nongovernmental organizations (NGOs)	Offshoring, 1:356
and activist groups, 1:128	and flexible labor, 2:99
and corporate social responsibility, 1:118	and labor relations, 1:170, 173

Off-site outsourcing, 1:446	Opportunity exploitation willingness (OEW), 1:14
OHSAS 180001 standard, 1: 465	"Optimal penalty" theory, 1: 262–264, 266
Oil companies, 1:294	Oracle, 1: 414, 2: 24
Okubayashi, K., 2:67	Order batching, 1:412
Old Deal, 2: 122	Order fulfillment, and supply-chain management, 1: 409
Older workers, 2: 166–167	O'Reilly, C., 2: 514
managerial practices for, 2:167	O'Reilly, C. A., 2: 38, 60
recruitment of, 2:166	Organisation for Economic Co-operation and Develop-
and role transitions, 2: 167	ment (OECD), 1: 46, 52–53
termination of, 2:167	Organization(s)
training for, 2: 166–167	and corporate entrepreneurship, 1: 14–15
Oligopoly, 1:352	ethical manufacturing and purpose of, 1: 463
Oliver Wyman, 2:446	integral framework for. See Integrating plurality
Olsen, C. P., 1:325	and Internet-based interorganizational systems, 1: 316
Olsen, K. M., 2:97	and mass customization, 1: 427
Olympic Games, 2: 29, 365, 501, 506	multilateral alliance issues with, 1: 341–342
O'Neill, Paul, 1: 108	problems facing 21st-century, 1: 12
One-to-one-marketing, 1: 422	role of, 2: 127
121Time, 1: 421	and sustainability, 1:254–256
Onshore, 1: 446	women managers' success and characteristics of,
Onshore outsourcing, 1: 446	1:161–162
On-shoring, 1:356	"Organizational-based self-esteem" (OBSE), 2:135
On-site medical clinics, 2: 106	Organizational borders, 2:27
On-site movers, 2:352	Organizational boundaries, 2: 68–69
On-site/offshore outsourcing, 1: 358–359	Organizational capabilities, 1:5
On-site outsourcing, 1: 358, 445–446	Organizational capital, 2: 218, 403–404
On-the-job experience, 2: 332	in customer value development, 2: 403
Ontologies, 2:345	deficiencies in, 2: 407
Oort, G. V., 2:107	payoffs of, 2:408
Oosterhof, A., 2:38	in successful product development, 2: 406
OPEC, 1:391	Organizational career development, 2:117
Openness, 2: 285, 457	Organizational career management (OCM), 2: 111,
Open office, 2: 382–383	114–117
Open-plan environments, 1: 454	and coaching, 2: 117
Open standards, and network markets, 1: 307	and destabilization of organizational careers, 2: 115
Open systems view, for work and family, 2:171–173	and development, 2: 116, 117
Operating agreements, competitive, 1:174	individual career management vs., 2: 111
Operating business, as organizational emergence indica-	and mentorship, 2:117
tor, 1:6	mutual benefits from, 2: 115–117
Operational assessment, of business process outsourcing,	and orientation, 2: 116
1:447	and performance evaluations, 2: 116–117
Operational costs and benefits, and activist tactics,	and selection, 2:116
1:131–132	and staffing policies, 2:115–116
Operations	and training, 2:116
business process outsourcing of, 1: 446	Organizational change
and sustainability, 1:256–257	change agency and nature of, 2: 424–426
Operations groups, and organizational security, 1: 506	leadership for, 2: 276–279
Operations management	revolutionary, 2: 459
and ethical manufacturing, 1: 462	types of, 2: 427–428
sustainability in, 1: 256	Organizational citizenship behavior (OCB), 1:226, 2:264
Opportunist corporations, 1: 381	Organizational climate
Opportunistic behavior	for creativity and innovation, 2: 457–458
and interconnected firms, 1: 330	and information privacy, 2:384–385
and strategic alliances, 1: 337	for mid- and late careers, 2:135
Opportunity, commitment to, 1:16	Organizational cohesiveness, 2:222
Opportunity development, as career strategy, 2: 125	Organizational crises, 1:110
opportunity doveropinent, as career strategy, 2.125	515amzanonai 511505, 1 ,110

Organizational crisis management, 1:106–114	organizational learning, 2:339
conceptual models of, 1:109–111	results of research on, 2:467–468
defined, 1: 106, 108–111	and risk-based storage construct, 2:464
disasters, 1:110	and social retrieval construct, 2:463, 464
environmental jolts, 1: 110	supply-side conceptualizations of, 2:461, 462
examples of, 1: 107–108	Organizational memory (OM), 2:338
future of, 1: 113–114	Organizational memory system (OMS), 2:339
predictable surprises, 1: 111	Organizational misbehavior (OMB), 2:220–229
problems, 1:111	and aggression, 2:224
strategic/tactical responses to crises, 1:111–113	antecedents of, 2: 221–223
Organizational culture(s)	and attitudes, 2:223
adaptation to, 2:255	behavior control for, 2:228
and diversity, 2:147	and bullying, 2: 224
in global management, 2:332–333	control systems for, 2:222
and organizational misbehavior, 2:222	corrective measures for, 2:228–229
and outsourcing, 1:449	and cyber crime, 2:226
and teleworking, 2:366	and employee theft, 2:225
and women management, 1:161	and external pressures, 2:222–223
and workaholism, 1:154–155	group-level antecedents of, 2:222–223
Organizational development (OD), 2:424	and hostility, 2:224
Organizational emergence, 1:2–8	and incivility, 2:224
empirical research on, 1:3–5	individual-level antecedents of, 2:223
future research, datasets for, 1:6–8	and internal pressures, 2:222–223
indicators for, 1:5–6	interpersonal manifestations of, 2:224–225
Katz and Gartner framework for, 1:2–3	interventions for, 2:227–229
nascent entrepreneurs, behaviors/activities of, 1:5	intraperson manifestations of, 2:223–224
Organizational entry, 2:116	and job design, 2:223
Organizational factors	management models for, 2:226–229
and IIOS, 1: 316	manifestations of, 2:223–226
and women management, 1:161–162	and organizational cohesiveness, 2:222
Organizational financial performance, 2:58–59	and organizational culture/climate, 2:222
Organizational forms	and organizational goals, 2:222
environmental supply chain management and evolving,	organizational-level antecedents of, 2:222
1:289–290	and personality, 2:223
future directions of, 1:486–487	and political behavior, 2:225
global projects as, 1:487	and preemployment, 2:227–228
Organizational goals, and organizational misbehavior,	prevention of, 2: 226, 227
2: 222	property manifestations of, 2:225–226
Organizational importance, 1:296	responses to, 2: 226–227
Organizational innovations, 1: 400	and revenge, 2:224
Organizational justice, 1:221, 222, 223	and sabotage, 2: 225–226
Organizational knowledge, 1:503, 2:336	and sexual harassment, 2:224
Organizational leaders, 2: 429	and social loafing, 2:224–225
Organizational learning	and substance abuse, 2:223–224
and knowledge management, 2:338–339	task-level antecedents of, 2:223
outsourcing and potential loss of, 1:446–447	types of, 2: 221
Organizationally approved (OA) tactics, 2: 212	and vandalism, 2: 225–226
Organizational members, as change agents, 2: 433	and violence, 2:224
Organizational memory, 2:461–470	and whistle-blowing, 2:225
and boundary conditions, 2: 466–467	and withdrawal behavior, 2:224
demand-side conceptualizations of, 2:461–46463	and workaholism, 2:224
in different task environments, 2:464–466	Organizational paranoia. See Paranoia, organizational
distributed and overlapping structures of, 2:461	Organizational performance
future research directions for, 2: 469	effects of human resource management practices on,
implications of research on, 2:468–469	2: 57f–58
and individual task performance 2.464_467	and environmental supply chain management 1.290

Organizational politics, in management settings, 2:211–219 and competition. 2:218–219 history of research into, 2:2211–213 management of, 2:218–219 negative view of, 2:213 perceptions of, 2:218–219 negative view of, 2:213 and political behavior, 2:214–218 positive view of, 2:213 strategies for, 2:213–214 tactics of, 2:213–214 diactics of, 2:2	Organizational politics, as career strategy, 2:125	"Organization cultures," 2:115
22:11-219 history of research into, 2:218-219 history of research into, 2:248 hand emphasis on humanistic values, 2:446-447 history of, 2:448 future of, 2:448 future of, 2:448 history of, 2:446 history of, 2:446 Organization into, 1:500-508 and context, 1:503-504 history of, 2:446 Organization into, 2:439 history of, 2:446 Organization into process, 1:506-507 business case for scrutiny of, 1:501-502 and performance issupport processes, 1:506 organization alterategies for stimulating innovation, 2:458-459 for work-home interaction, 2:458-459 for work-home interaction	Organizational politics, in management settings,	
history of research into. 2:211–213 management of, 2:218–219 negative view of, 2:213 perceptions of, 2:212–213 positive view of, 2:213 strategies for, 2:213–214 tactics of, 2:213–214 tactics of, 2:213–214 organizational security, 1:500–508 assets identification, 1:506 and attack methody/lools/rechniques, 1:506–507 business case for scrutiny of, 1:501–502 as competitive edge, 1:508 considerations with, 1:502–506 and context, 1:503, 504 contingency planning in, 1:508 in core transformation process, 1:505 and performance factors, 1:502 proactive/reactive strategies for, 1:507 processes of, 1:504 reviewing outcomes in, 1:507–508 soclariost strategies for, 1:507 processes of, 1:502–506 and structure, 1:505 of organizational structure(s), 1:477 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 and formal planning constraints, 1:475–476 of organizational structures (s.1505–506 and structure, 1:503 for work-home interaction, 2:458–459 for work-home interaction, 2:458–459 of or stimulating innovation, 2:458 T-group training in, 2:439 T	2: 211–219	
history of research into. 2:211–213 management of, 2:218–219 negative view of, 2:213 perceptions of, 2:212–213 positive view of, 2:213 strategies for, 2:213–214 tactics of, 2:213–214 tactics of, 2:213–214 organizational security, 1:500–508 assets identification, 1:506 and attack methody/lools/rechniques, 1:506–507 business case for scrutiny of, 1:501–502 as competitive edge, 1:508 considerations with, 1:502–506 and context, 1:503, 504 contingency planning in, 1:508 in core transformation process, 1:505 and performance factors, 1:502 proactive/reactive strategies for, 1:507 processes of, 1:504 reviewing outcomes in, 1:507–508 soclariost strategies for, 1:507 processes of, 1:502–506 and structure, 1:505 of organizational structure(s), 1:477 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 and formal planning constraints, 1:475–476 of organizational structures (s.1505–506 and structure, 1:503 for work-home interaction, 2:458–459 for work-home interaction, 2:458–459 of or stimulating innovation, 2:458 T-group training in, 2:439 T	and competition, 2:218–219	attitude survey techniques in, 2: 438–439
negarfve view of, 2:213 perceptions of, 2:212–213 and political behavior, 2:214–218 positive view of, 2:213 strategies for, 2:213–214 tactics of, 2:213–214 tactics of, 2:213–214 organizational security, 1:500–508 assets identification, 1:506 and attack methods/tools/techniques, 1:506–507 business case for scrutiny of, 1:501–502 as competitive edge, 1:508 considerations with, 1:502–506 and cortext, 1:503, 504 contingency planning in, 1:508 in core transformation process, 1:505–506 importance of, 1:508 management buy-in for, 1:508 in management support processes, 1:500 and people, 1:504–505 and people, 1:504–505 and people, 1:504–505 and people, 1:504–505 and people, 1:504–508 scenario study in, 1:507–508 scenario study in, 1:507–508 scenario study in, 1:507–508 scularion structure, 1:505 organizational structure(s), 1:472 adaptive challenge for, 1:472–473 aBPO and changing, 1:445 and cognitive constraints, 1:475 and formal planning constraints, 1:475–476 and growth constraints, 1:476–477 impact of, 1:473 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations constraints, 1:475–476 and growth constraints, 1:476–477 impact of, 1:473 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations constraints, 1:476–477 impact of, 1:473 and mass customization of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations adaptive conflicts in, 1:477–479 of sport organizations adaptive conflicts in, 1:477–479 of sport organizations organizations, 2:505–506 and strategy formulation constraints, 1:475–476 organization alteories of imitation, 1:401–402 organization memory in, 2:462 organization memory in, 2:462 organization memory in, 2:462 organization dimmate, 2:135		
negarfve view of, 2:213 perceptions of, 2:212–213 and political behavior, 2:214–218 positive view of, 2:213 strategies for, 2:213–214 tactics of, 2:213–214 tactics of, 2:213–214 organizational security, 1:500–508 assets identification, 1:506 and attack methods/tools/techniques, 1:506–507 business case for scrutiny of, 1:501–502 as competitive edge, 1:508 considerations with, 1:502–506 and cortext, 1:503, 504 contingency planning in, 1:508 in core transformation process, 1:505–506 importance of, 1:508 management buy-in for, 1:508 in management support processes, 1:500 and people, 1:504–505 and people, 1:504–505 and people, 1:504–505 and people, 1:504–505 and people, 1:504–508 scenario study in, 1:507–508 scenario study in, 1:507–508 scenario study in, 1:507–508 scularion structure, 1:505 organizational structure(s), 1:472 adaptive challenge for, 1:472–473 aBPO and changing, 1:445 and cognitive constraints, 1:475 and formal planning constraints, 1:475–476 and growth constraints, 1:476–477 impact of, 1:473 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations constraints, 1:475–476 and growth constraints, 1:476–477 impact of, 1:473 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations constraints, 1:476–477 impact of, 1:473 and mass customization of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations adaptive conflicts in, 1:477–479 of sport organizations adaptive conflicts in, 1:477–479 of sport organizations organizations, 2:505–506 and strategy formulation constraints, 1:475–476 organization alteories of imitation, 1:401–402 organization memory in, 2:462 organization memory in, 2:462 organization memory in, 2:462 organization dimmate, 2:135	· · · · · · · · · · · · · · · · · · ·	
perceptions of, 2:212-213 and political behavior, 2:214-218 positive view of, 2:213 strategies for, 2:213-214 tactics of, 2:213-214 Tactics of, 2:213-214 Organizational practice, 2:312 Organizational security, 1:500-508 assets identification, 1:506 and attack methods/hools/techniques, 1:506-507 business case for scrutiny of, 1:501-502 as competitive edge, 1:508 considerations with, 1:502-506 and context, 1:503, 504 contingency planning in, 1:508 in core transformation process, 1:505-506 importance of, 1:508 management support processes, 1:506 and people, 1:504-505 and people, 1:504-505 and people, 1:504-505 and people, 1:504-505 and people, 1:504-506 purpose of, 1:502-506 and people, 1:504-508 scenario study in, 1:507-508 and structure, 1:505 vulnerabilities identification, 1:506 Organizational strategies for stimulating innovation, 2:458-459 for work-home interaction, 2:82-84 Organization strategies for stimulating innovation, 2:458-459 for work-home interaction, 2:82-84 Organization strategies for stimulating innovation, 2:458-459 for work-home interaction, 2:82-84 Organization strategies for stimulating innovation, 2:458-459 for work-home interaction, 2:82-84 Organization strategies for stimulating innovation, 2:458-459 for work-home interaction, 2:82-84 Organization strategies for stimulating innovation, 2:458-459 for work-home interaction, 2:82-84 Organization strategies for stimulating innovation, 2:458-459 for work-home interaction, 2:82-84 Organization altracture(s), 1:472-479 and adaptation constraints, 1:475-476 and growth constraints, 1:475-476 organization and processes and the constraints of	•	
and political behavior, 2:214–218 positive view of, 2:213 strategies for, 2:213–214 tactics of, 2:213–214 Organizational practice, 2:312 Organizational practice, 2:312 Organizational security, 1:500–508 assets identification, 1:506 and attack methods/tools/techniques, 1:506–507 business case for scrutiny of, 1:501–502 as competitive edge, 1:508 considerations with, 1:502–506 and context, 1:503, 504 contingency planning in, 1:508 in core transformation process, 1:505–506 importance of, 1:508 management buy-in for, 1:508 in management support processes, 1:506 and people, 1:504–505 and performance factors, 1:502 proactive/reactive strategies for, 1:507 processes of, 1:502–506 purpose of, 1:504 reviewing outcomes in, 1:507–508 scenario study in, 1:507–508 scutions framework for, 1:506–508 and structure, 1:505 organizational strategies for stimulating imovation, 2:458–459 for work-home interaction, 2:82–84 Organizational strategies for stimulating imovation, 2:458–459 for work-home interaction, 2:82–84 Organizational strategies for stimulating imovation, 2:458–459 and doptities identification, 1:401 Organizational throutere(s), 1:472–479 and prowth constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and compitive constraints, 1:475 and formal planning constraints, 1:475 and formal planning constraints, 1:475 and formal planning constraints, 1:475–476 organizational theories of imitation, 1:401–402 organization onlimate, 2:135	_	
positive view of, 2:213 strategies for, 2:213–214 tactics of, 2:213–214 prograinational practice, 2:312 organizational practice, 2:312 organizational security, 1:500–508 assets identification, 1:506 and attack methods/tools/techniques, 1:506–507 business case for scrutiny of, 1:501–502 as competitive edge, 1:508 considerations with, 1:502–506 and context, 1:503, 504 contingency planning in, 1:508 in core transformation process, 1:505–506 importance of, 1:508 management buy-in for, 1:508 in management buy-in for, 1:508 in management buy-in for, 1:508 organization and performance factors, 1:502 proactive/reactive strategies for, 1:507 processes of, 1:502–506 purpose of, 1:504 reviewing outcomes in, 1:507–508 solutions framework for, 1:506–508 and structure, 1:505 vulnerabilities identification, 1:506 Organizational structure(s), 1:472–479 and adaptation constraints, 1:477 adaptive constraints, 1:477 adaptive challenge for, 1:472–479 and gondition on straints, 1:475 and formal planning constraints, 1:475 and growth constraints, 1:475 and argomyth constraints, 1:475 and mark sustemization, 1:422 purpose/function of, 1:473–475 organization adaptive conflicts in, 1:477–479 of of port organizations, 2:055–506 and strategy formulation constraints, 1:475 and mass outsomization in, 1:422 purpose/function of, 1:473–475 or of port organizations, 2:505–506 and strategy formulation constraints, 1:475–476 organization olimate, 2:135	* *	•
strategies for, 2:213–214 tactics of, 2:213–214 Organizational practice, 2:312 Organizational security, 1:500–508 assets identification, 1:506 and attack methods/tools/techniques, 1:506–507 business case for scrutiny of, 1:501–502 as competitive edge, 1:508 considerations with, 1:502–506 and context, 1:503, 504 contingency planning in, 1:508 in core transformation process, 1:505–506 importance of, 1:508 management buy-in for, 1:508 ond people, 1:504–505 and people, 1:504–505 and people, 1:504–505 and people, 1:504–506 purpose of, 1:502–506 purpose of, 1:502 proactive/reactive strategies for, 1:507 processes of, 1:502–508 solutions framework for, 1:507–508 solutions framework for, 1:506 Organizational structure(s), 1:472 and adaptation constraints, 1:477 adaptive challenge for, 1:472–479 and adaptation constraints, 1:475 and formal planning constraints, 1:475–476 and growth constraints, 1:475 and mass eustomization, 1:422 purpose/function of, 1:473, 475 organizational theories of imitation, 1:401–402 organization management, 1:446 Organizational structure(s), 1:507 oriental continue, 2:145 Organization management for, 2:145–148 Organization developing countries, 1:195 Orientation, 2:116 Original equipment manufacturers (OEM), 2:99 Orosz, J. L., 2:512–514 Orthodox cultural theory, 2:151 Orton, J. D., 2:246 Orsanization structure(s), 1:472–479 and adaptation constraints, 1:475 and formal planning constraints, 1:475–476 organizational theories of imitation, 1:401 Outsourcing benefits from, 1:356–357 defined, 1:355 and formal planning constraints, 1:475–476 Organizational theories of imitation, 1:402 purpose/function of, 1:473,475 organization memory in, 2:462 Or	•	future of, 2: 448
tractics of, 2:213–214 Organizational practice, 2:312 Organizational practice, 2:312 Organizational security, 1:500–508 assets identification, 1:506 and attack methods/tools/techniques, 1:506–507 business case for scrutiny of, 1:501–502 as competitive edge, 1:508 considerations with, 1:502–506 and context, 1:503, 504 contingency planning in, 1:508 in core transformation process, 1:505–506 importance of, 1:508 management support processes, 1:506 and people, 1:504–505 and performance factors, 1:502 processes of, 1:502–506 purpose of, 1:504 reviewing outcomes in, 1:507–508 solutions framework for, 1:506 Organizational structures, 1:505 vulnerabilities identification, 1:506 Organizational structures, 1:475 and growth constraints, 1:477 adaptive challenge for, 1:472–479 and adaptation constraints, 1:475–476 and growth constraints, 1:475–476 and growth constraints, 1:475–476 organization assutomization, 1:422 purpose/function of, 1:473–475 of sport organizations assutomization, 1:422 purpose/function of, 1:473–479 of sport organization sustomization, 1:422 purpose/function of, 1:473–479 of sport organization sustomization, 1:422 purpose/function of, 1:473–479 of sport organization memory in, 2:462 Organization olimate, 2:135	•	
Organizational practice, 2:312 Organizational security, 1:500–508 assets identification, 1:506 and attack methods/tools/techniques, 1:506–507 business case for scrutiny of, 1:501–502 as competitive edge, 1:508 considerations with, 1:502–506 and context, 1:503, 504 contingency planning in, 1:508 in core transformation process, 1:505–506 importance of, 1:508 in management buy-in for, 1:508 in management support processes, 1:506 and people, 1:504–505 and people, 1:505–506 and people, 1:504–508 scenario study in, 1:507–508 scenario study in, 1:507–508 scenario study in, 1:507–508 solutions framework for, 1:506–508 and structure, 1:505 vulnerabilities identification, 1:506 Organizational strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organizational structure(s), 1:472–479 and adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:477 adaptive challenge for, 1:472–473 and formal planning constraints, 1:475–476 and growth constraints, 1:475 of sport organizational adaptive conflicts in, 1:477–479 of sport organization processes of intiation, 1:401–402 organization memory in, 2:462 Organization man, 2:434–437 work of OD practitioners, 2:437 work of OD practitioners, 2:437 work of OD practitioners, 2:437 organization man, 2:121 Or	•	
Organizational security, 1:500–508 assets identification, 1:506 and attack methods/tools/techniques, 1:506–507 business case for scrutiny of, 1:501–502 as competitive edge, 1:508 considerations with, 1:502–506 and context, 1:503, 504 contingency planning in, 1:508 in core transformation process, 1:505–506 importance of, 1:508 management buy-in for, 1:508 in management buy-in for, 1:508 in management support processes, 1:506 and performance factors, 1:502 proactive/reactive strategies for, 1:507 processes of, 1:504 reviewing outcomes in, 1:507–508 solutions framework for, 1:506–508 and structure, 1:505 vulnerabilities identification, 1:506 Organizational strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organization at structure(s), 1:472–479 and adaptation constraints, 1:475 and formal planning constraints, 1:475–476 and growth constraints, 1:475 and formal planning constraints, 1:475–476 and growth constraints, 1:475 and formal planning constraints, 1:475–476 and growth constraints, 1:475–476 and growth constraints, 1:475–476 organization and structure(s), 1:472–479 of sport organization on (1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organization on first in, 1:477–479 of sport organization constraints, 1:475–476 Organization and theories of imitation, 1:401 Organization na, 2:439 values promoted in, 2:437 Organization na, 2:121 Organization na, 2:121 Organization na, 2:145 Organizatio		· · · · · · · · · · · · · · · · · · ·
assets identification, 1:506 and attack methods/hools/techniques, 1:506–507 business case for scrutiny of, 1:501–502 as competitive edge, 1:508 considerations with, 1:502–506 and context, 1:503, 50-4 contingency planning in, 1:508 in core transformation process, 1:505–506 importance of, 1:508 management bup-in for, 1:508 in management support processes, 1:506 and people, 1:504–505 and performance factors, 1:502 proactive/reactive strategies for, 1:507 processes of, 1:502–506 purpose of, 1:504 reviewing outcomes in, 1:507–508 scenario study in, 1:507–508 scolutions framework for, 1:506 Organizational structure(s), 1:472–479 and adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475–476 and growth constraints, 1:475–476 and growth constraints, 1:473–475 of sport organization of, 1:473–475 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organization memory in, 2:462 Organization man, 2:121 Organization man, 2:122 Organization man, 2:123 Organization man, 2:125 Organization man, 2:125 Organization man, 2:125 Organization man, 2:121 Organization man, 2:121 Organization man, 2:122 Organization man, 2:123 Organization man, 2:121 Organization man, 2:121 Organization man, 2:122 Organization man, 2:122 Organization man, 2:122 Organization man, 2:122 Organization man, 2:123 Organization man, 2:125 Organization man, 2:122 Organization man, 2:122 Organization man, 2:122 Organization man, 2:123 Organization man, 2:121 Organization man, 2:125 Organization man, 2:122 Organization man, 2:125 Organization petologe cuntries, 1:195 Organi		
and attack methods/tools/techniques, 1:506–507 business case for scrutiny of, 1:508 considerations with, 1:508 considerations with, 1:508 considerations with, 1:502–506 and context, 1:503, 504 contingency planning in, 1:508 in core transformation process, 1:505–506 importance of, 1:508 management buy-in for, 1:508 management buy-in for, 1:508 and people, 1:504–505 and performance factors, 1:502 procastive/reactive strategies for, 1:507 processes of, 1:502–506 purpose of, 1:504 reviewing outcomes in, 1:507–508 solutions framework for, 1:506–508 and structure, 1:505 yulnerabilities identification, 1:506 Organizational strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organizational structure(s), 1:472–479 and adaptation constraints, 1:475 and formal planning constraints, 1:475 and formal planning constraints, 1:475 and formal planning constraints, 1:475 and growth constraints, 1:475 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizational theories of imitation, 1:401–402 organization memory in, 2:462 Organization limate, 2:135 work of OD practitioners, 2:437 ada preparation Development Institute, 2:437 "organization mam," 2:121 Organization, 2:111 and careers, 2:128 diversity management for, 2:145–148 Organizations, 2:115 Organization, 2:116 Organization, 2:111 organization, 2:111 and careers, 2:128 diversity management for, 2:145–148 Organizations, 2:115 Organization, 2:111 organization, 2:111 and careers, 2:128 diversity management for, 2:145–148 Organization, 2:115 Orton, J. D., 2:246 Osland, J., 1:183, 184 Osterman, P., 2:57 O'Sullivan, M., 2:66, 67 Oticon, 1:455, 456, 459 Outbound logistics in environmental supply chain management, 1:287–288 RFID in, 2:415 Outbound spillover rent, 1:331 Outcome expectations, 2:116 Outplacement, 2:117 Outsourcing, See also Business process outsourcing and ethical manufacturing, 1:462 and fersible labor, 2:99 and supply-chain management, 1:410 Outsourcing, See also Busin	•	
business case for scrutiny of, 1:501–502 as competitive edge, 1:508 considerations with, 1:502–506 and context, 1:503, 504 contingency planning in, 1:508 in core transformation process, 1:505–506 importance of, 1:508 management buy-in for, 1:508 in management support processes, 1:506 and people, 1:504–505 and performance factors, 1:502 proactive/reactive strategies for, 1:507 processes of, 1:502–506 purpose of, 1:504 reviewing outcomes in, 1:507–508 scenario study in, 1:507–508 solutions framework for, 1:506 Organizational strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organizational structure(s), 1:472 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 and cognitive constraints, 1:475 and formal planning onstraints, 1:475 and sorgative constraints, 1:475 and growth constraints, 1:475 and growth constraints, 1:475 and sport organizations, 2:505–506 and strategy formulation constraints, 1:475 and formal planning constraints, 1:475 and strategy formulation constraints		
as competitive edge, 1:508 considerations with, 1:502–506 and context, 1:503, 504 contingency planning in, 1:508 in core transformation process, 1:505–506 importance of, 1:508 management buy-in for, 1:508 in management support processes, 1:506 and people, 1:504–505 and people, 1:504–505 and people, 1:504–505 and people, 1:504 proactive/reactive strategies for, 1:507 processes of, 1:502–506 purpose of, 1:504 reviewing outcomes in, 1:507–508 solutions framework for, 1:506–508 and structure, 1:505 vulnerabilities identification, 1:506 Organizational strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organizational structure(s), 1:472–479 and adaptation constraints, 1:475 and formal planning constraints, 1:475 and formal planning constraints, 1:475 and formal planning constraints, 1:475 and strategy formulation constraints, 1:475 organizational theories of imitation, 1:401–402 organization man," 2:121 Organization and careers, 2:128 diversity management for, 2:145–148 diversity management for, 2:145–148 Organizing, in developing countries, 1:195 Orientation, 2:116 Original equipment manufacturers (OEM), 2:99 Orosz, J. L., 2:512–514 Orthodox cultural theory, 2:151 Orthodox cultural theory, 2:151 Orthodox cultural theory, 2:151 Orton, J. D., 2:246 Osland, J., 1:183, 184 Osterman, P., 2:57 O'Sullivan, M., 2:66, 67 Orticon, 1:455, 456, 459 Outbound logistics in environmental supply chain management, 1:287–288 RFID in, 2:415 Outcome expectations, 2:111 Outcome expectations, 2:110 Outcome, processes, 1:506 Outcome, process vs., 1:497 Outdoors educational activities, 2:116 Outcome, processor, 1:502 outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outcome, processor, 1:505 outcome, processor, 1:412 Outcome, processor, 1:412 Outcome, processor, 1:412 Outcome, processor, 1:412 Outcomes, processor, 1:412 Outcomes, processor, 1:412 outcomes, processor, 1:412 Outcomes, proce	•	
considerations with, 1:502–506 and context, 1:503, 504 contingency planning in, 1:508 in core transformation process, 1:505–506 importance of, 1:508 in management buy-in for, 1:508 in management buy-in for, 1:508 in management support processes, 1:506 and people, 1:504–505 and performance factors, 1:502 proactive/reactive strategies for, 1:507 purpose of, 1:502–506 and structure, 1:505 vulnerabilities identification, 1:506 Organization strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organization at strategies for stimulating innovation, 2:458–459 and daptation constraints, 1:477 adaptive challenge for, 1:472–473 and mass customization, 1:445 and cognitive constraints, 1:475 and formal planning constraints, 1:475 and growth constraints, 1:475 and strategy formulation constraints, 1:475 and strategy formulation constraints, 1:475 inspact of, 1:473 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organization constraints, 1:475 organization at theories of imitation, 1:401–402 organization memory in, 2:462 Organization memory in, 2:462 Organization climate, 2:135 Organizations diversity management for, 2:145–148 Organization, 2:1216 Organization, in dveloping countries, 1:195 Organization, eveloping countries, 1:195 Organization, in dveloping countries, 1:195 Organization, in dveloping countries, 1:195 Organization processes, 1:506 Organization processes, 1:506 Organization constraits, 1:507 Organization timate, 2:155 Organization cimate, 2:155	· · · · · · · · · · · · · · · · · · ·	
and context, 1:503, 504 contingency planning in, 1:508 in core transformation process, 1:505–506 importance of, 1:508 management buy-in for, 1:508 in management buy-in for, 1:508 in management support processes, 1:506 and people, 1:504–505 and performance factors, 1:502 proactive/reactive strategies for, 1:507 processes of, 1:504 reviewing outcomes in, 1:507–508 solutions framework for, 1:506–508 and structure, 1:505 organizational strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organizational structure(s), 1:472–479 and adaptation constraints, 1:475 and formal planning constraints, 1:475 and formal planning constraints, 1:475 and formal planning constraints, 1:475 and growth constraints, 1:475 or sport organization, 2:505–506 and strategy formulation constraints, 1:475 organizational theories of imitation, 1:401–402 organization nemory in, 2:462 Organization climate, 2:135 and careers, 2:128 diversity management for, 2:145–148 Organization processes, 1:506 Organization, in developing countries, 1:195 Orientation, 2:116 Original equipment manufacturers (OEM), 2:99 Orosz, J. L., 2:512–514 Orthodox cultural theory, 2:151 Orton, J. D., 2:246 Osland, J., 1:183, 184 Osterman, P., 2:57 O'Sullivan, M., 2:66, 67 Oticon, 1:455, 456, 459 Outbound logistics in environmental supply chain management, 1:287–288 Outcome expectations, 2:112 Outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturers (OEM), 2:99 Orientation, 2:116 Original equipment manufacturers (OEM), 2:99 Orientation, 2:115 Orton, J. D., 2:246 Osland, J., 1:183, 184 Osterman, P., 2:57 O'Sullivan, M., 2:66, 67 Oticon, 1:455, 456, 459 Outbound logistics in environmental supply chain management, 1:287–288 Outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturering, 1:462 and flexible labor, 2:99 and supply-chain man		· ·
contingency planning in, 1:508 in core transformation process, 1:505–506 importance of, 1:508 management buy-in for, 1:508 management support processes, 1:506 and people, 1:504–505 and performance factors, 1:502 proactive/reactive strategies for, 1:507 processes of, 1:502–506 purpose of, 1:504 reviewing outcomes in, 1:507–508 solutions framework for, 1:506 Sorganizational structure, 1:505 vulnerabilities identification, 1:506 Organizational structure(s), 1:472–479 and adaptation constraints, 1:447 and cognitive constraints, 1:475 and formal planning constraints, 1:475 and growth constraints, 1:475 and formal planning constraints, 1:475 and formal planning constraints, 1:475 and growth constraints, 1:475 and growth constraints, 1:475 and growth constraints, 1:475 and formal planning constraints, 1:475 and strategy formulation constraints, 1:475 and formal planning constraints, 1:475 and form		· ·
in core transformation process, 1:505–506 importance of, 1:508 management buy-in for, 1:508 in management support processes, 1:506 and people, 1:504–505 and performance factors, 1:502 proactive/reactive strategies for, 1:507 processes of, 1:502–506 purpose of, 1:504 reviewing outcomes in, 1:507–508 scenario study in, 1:507–508 scenario study in, 1:507–508 solutions framework for, 1:506–508 and structure, 1:505 vulnerabilities identification, 1:506 Organizational strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organizational structure(s), 1:472–479 and adaptation constraints, 1:475 and formal planning constraints, 1:475 and growth constraints, 1:475 and planning constraints, 1:475 and growth constraints, 1:475 and planning constraints, 1:475 and p		
importance of, 1:508 management buy-in for, 1:508 in management support processes, 1:506 and people, 1:504–505 and performance factors, 1:502 proactive/reactive strategies for, 1:507 processes of, 1:502–506 purpose of, 1:504 reviewing outcomes in, 1:507–508 scenario study in, 1:507–508 solutions framework for, 1:506 Organizational strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organizational structure(s), 1:472–479 and adaptation constraints, 1:475 and formal planning constraints, 1:475 and growth constraints, 1:475 and growth constraints, 1:475 and growth constraints, 1:475 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization almate, 2:135 Orientation, 2:116 Original equipment manufacturers (OEM), 2:99 Orosz, J. L., 2:512–514 Orthodox cultural theory, 2:151 Orton, J. D., 2:246 Osland, J., 1:183, 184 Ostema, P., 2:57 O'Sullivan, M., 2:66, 67 Oticon, 1:455, 456, 459 Outbound logistics in environmental supply chain management, 1:287–288 RFID in, 2:415 Outcome expectations, 2:112 Outcome sprocess vs., 1:497 Outloors educational activities, 2:116 Outsourcing. See also Business process outsourcing and ethical manufacturers (OEM), 2:99 Orientation, 2:151 Orthodox cultural theory, 2:151 Orton, J. D., 2:246 Osland, J., 1:183, 184 Ostema, P., 2:57 O'Sullivan, M., 2:66, 67 Oticon, 1:455, 456, 459 Outbound logistics in environmental supply chain management, 1:287–288 RFID in, 2:415 Outcome expectations, 2:116 Outsourcing. See also Business process outsourcing and ethical manufacturers (OEM), 2:99 and supply-chain management, 1:287–288 arien in evironmental supply chain management, 1:287–288 arien in evironmental supply chain management, 1:287–288 arien in evironmental supply chain management, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturers (OEM), 2:99 and su		· ·
management buy-in for, 1:508 in management support processes, 1:506 and people, 1:504–505 and performance factors, 1:502 proactive/reactive strategies for, 1:507 processes of, 1:502–506 purpose of, 1:504 reviewing outcomes in, 1:507–508 scenario study in, 1:507–508 solutions framework for, 1:506 Organizational structure, 1:505 vulnerabilities identification, 1:506 Organizational structure(s), 1:472–479 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475 and growth constraints, 1:475 and performance factors, 1:506 Organizational structure(s), 1:507 Ortion, J. D., 2:246 Osland, J., 1:183, 184 Osterman, P., 2:57 O'sullivan, M., 2:66, 67 Oticon, 1:455, 456, 459 Outbound logistics in environmental supply chain management, 1:287–288 RFID in, 2:415 Outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing. and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 of IT, 1:356–362 motivations for, 1:358 Organization elimate, 2:135 Organization elimate, 2:135	÷	
in management support processes, 1:506 and people, 1:504—505 and performance factors, 1:502 proactive/reactive strategies for, 1:507 processes of, 1:502–506 purpose of, 1:504 reviewing outcomes in, 1:507–508 scenario study in, 1:507–508 solutions framework for, 1:506–508 and structure, 1:505 vulnerabilities identification, 1:506 Organizational strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organizational structure(s), 1:472–479 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475 and formal planning constraints, 1:475 and formal planning constraints, 1:475 and growth constraints, 1:475 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization elmory in, 2:462 Organization climate, 2:135 Orosz, J. L., 2:512–514 Orthodox cultural theory, 2:151 Osland, J., 1:183, 184 Osterman, P., 2:57 O'Sullivan, M., 2:66, 67 O'ction, J. D., 2:246 Osland, J., 1:183, 184 Osterman, P., 2:57 O'sullivan, M., 2:66, 67 O'ction, 1:455, 456, 459 Outbound logistics in environmental supply chain management, 1:287–288 RFID in, 2:415 Outcome expectations, 2:112 Outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:339 to India, 1:358–363 of IT, 1:356–362 motivations for, 1:357 on-site model of, 1:358 on-site/offshore model of, 1:358–359	•	
and people, 1:504–505 and performance factors, 1:502 proactive/reactive strategies for, 1:507 processes of, 1:502–506 purpose of, 1:504 reviewing outcomes in, 1:507–508 scenario study in, 1:507–508 solutions framework for, 1:506 Organizational strategies for stimulating innovation, 2:458–459 organizational structure(s), 1:472–479 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475–476 and growth constraints, 1:475–476 and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 Orthodox cultural theory, 2:151 Orton, J. D., 2:246 Orsan, J. D., 2:246 Orsanl, J., 1:183, 184 Osterman, P., 2:57 Orton, J. D., 2:246 Osland, J., 1:183, 184 Osterman, P., 2:57 O'Sullivan, M., 2:66, 67 Ottoon, 1:453, 456, 459 Outbound logistics in environmental supply chain management, 1:287–288 RFID in, 2:415 Outcome expectations, 2:112 Outcome, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing, See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 of IT, 1:356–362 motivations for, 1:358 on-site/offshore model of, 1:358–359	· · · · · · · · · · · · · · · · · · ·	
and performance factors, 1:502 proactive/reactive strategies for, 1:507 processes of, 1:502–506 purpose of, 1:504 reviewing outcomes in, 1:507–508 scenario study in, 1:507–508 solutions framework for, 1:506 Organizational structure, 1:505 vulnerabilities identification, 1:506 Organizational structure(s), 1:472–479 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475 and formal planning constraints, 1:475–476 and growth constraints, 1:476–477 impact of, 1:473 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations attractives of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 Orton, J. D., 2:246 Osterman, P., 2:57 Osland, J., 1:183, 184 Osterman, P., 2:57 Osland, J., 1:183, 184 Osterman, P., 2:67 O'Sullivan, M., 2:66, 67 Oticon, 1:455, 456, 459 Outbound logistics in environmental supply chain management, 1:287–288 RFID in, 2:415 Outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing, See also Business process outsourcing and ethical manufacturing, 1:462 and supply-chain management, 1:331 Outcomes, process vs., 1:497 Outsourcing, See also Business process outsourcing and ethical manufacturing, 1:462 and elical manufacturing in the process vs., 1:497 Outsourcing, See also Business process outsourcing and ethical manufacturing in the process vs., 1:497 Outsourcing, See also Business process outsourcing and ethi	• • • •	
proactive/reactive strategies for, 1:507 processes of, 1:502–506 purpose of, 1:504 reviewing outcomes in, 1:507–508 scenario study in, 1:507–508 solutions framework for, 1:506–508 and structure, 1:505 vulnerabilities identification, 1:506 Organizational strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organizational structure(s), 1:472–479 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475 and formal planning constraints, 1:475–476 and growth constraints, 1:475 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 Osland, J., 1:183, 184 Osterman, P., 2:57 O'Sullivan, M., 2:66, 67 Ovsullivan, M., 2:66, 459 Ovsullivan, M., 2:66, 459 Ovsullivan, M., 2:66, 459 Ovsullivan, M., 2:66, 67 Oticon, 1:455, 456, 459 Outbound logistics in environmental supply chain management, 1:287–288 RFID in, 2:415 Outcome expectations, 2:112 Outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:355–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 of IT, 1:356–362 motivations for, 1:358 on-site/offshore model of, 1:358–359		· · · · · · · · · · · · · · · · · · ·
processes of, 1:502–506 purpose of, 1:504 reviewing outcomes in, 1:507–508 scenario study in, 1:507–508 solutions framework for, 1:506–508 and structure, 1:505 vulnerabilities identification, 1:506 Organizational strategies for stimulating innovation, 2:458–459 of organizational structure(s), 1:472–479 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475 and formal planning constraints, 1:475–476 and growth constraints, 1:476–477 impact of, 1:473 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 Osterman, P., 2:57 O'Sullivan, M., 2:66, 67 Oticon, 1:455, 456, 459 Outbound logistics in environmental supply chain management, 1:287–288 RFID in, 2:415 Outcome expectations, 2:112 Outcome expectations, 2:112 Outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing, See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 of IT, 1:356–362 motivations for, 1:357 on-site model of, 1:358 on-site/offshore model of, 1:358–359	•	
purpose of, 1:504 reviewing outcomes in, 1:507–508 scenario study in, 1:507–508 solutions framework for, 1:506–508 and structure, 1:505 vulnerabilities identification, 1:506 Organizational strategies for stimulating innovation, 2:458–459 of reviewing outcomes interaction, 2:82–84 Organizational structure(s), 1:472–479 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475 and formal planning constraints, 1:475–476 and growth constraints, 1:475 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organization al theories of imitation, 1:401–402 organization remory in, 2:462 Organization climate, 2:135 O'Sullivan, M., 2:66, 67 Oticon, 1:455, 456, 459 Outbound logistics in environmental supply chain management, 1:287–288 RFID in, 2:415 Outcome expectations, 2:112 Outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-ch	•	
reviewing outcomes in, 1:507–508 scenario study in, 1:507–508 solutions framework for, 1:506–508 and structure, 1:505 vulnerabilities identification, 1:506 Organizational strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organizational structure(s), 1:472–479 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475 and growth constraints, 1:475 and growth constraints, 1:476–477 impact of, 1:473 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:475–476 Organizational theories of imitation, 1:401–402 organization relimate, 2:135 Oticon, 1:455, 456, 459 Outbound logistics in environmental supply chain management, 1:287–288 RFID in, 2:415 Outcome expectations, 2:112 Outcomes, process vs., 1:497 Outplacement, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:287–288 RFID in, 2:415 Outcome expectations, 2:116 Outplacement, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 of IT, 1:356–362 motivations for, 1:358 on-site model of, 1:358 on-site model of, 1:358	•	
scenario study in, 1:507–508 solutions framework for, 1:506–508 and structure, 1:505 Vulnerabilities identification, 1:506 Organizational strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organizational structure(s), 1:472–479 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475 and formal planning constraints, 1:475 and growth constraints, 1:475 and mass customization, 1:422 purpose/function of, 1:473—475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 Outbound logistics in environmental supply chain management, 1:287–288 RFID in, 2:415 Outcome expectations, 2:112 Outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:287–288 RFID in, 2:415 Outcome expectations, 2:112 Outcome s, process vs., 1:497 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357 of IT, 1:356–362 motivations for, 1:357 on-site model of, 1:358 on-site/offshore model of, 1:358–359		
solutions framework for, 1:506–508 and structure, 1:505 vulnerabilities identification, 1:506 Organizational strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organizational structure(s), 1:472–479 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475 and formal planning constraints, 1:475 and mass customization, 1:422 purpose/function of, 1:473—475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475—476 Organizational theories of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 in environmental supply chain management, 1:287–288 RFID in, 2:415 Outcome expectations, 2:112 Outcome expectations, 2:112 Outcome expectations, 2:116 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and lexible labor, 2:99 and supply-chain management, 1:331 Outcome expectations, 2:112 Outcome expectations, 2:10 Outcome expectations, 2:112 Outcome expectations, 2:16 Outcome expectations, 2:16 Outcome expectations, 2:16 Outcome expectations, 2:16 Outcome expectations, 2:112 Outcome expectations, 2:116 Outcome expectations, 2:116 Outcome expectations, 2:112 Outcome expectations, 2:116 Outcome expectations, 2:116 Outcome expectations, 2:116 Outcome expectations, 2:112 Outcome expectations, 2:112 Outcome expectations, 2:112 Outcome expectations, 2:146		
and structure, 1:505 vulnerabilities identification, 1:506 Organizational strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organizational structure(s), 1:472–479 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475 and formal planning constraints, 1:475 and growth constraints, 1:476–477 impact of, 1:473 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organization memory in, 2:462 Organization climate, 2:135 1:287–288 RFID in, 2:415 Outbound spillover rent, 1:331 Outcome expectations, 2:112 Outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 of IT, 1:356–362 on-site model of, 1:358–359		•
vulnerabilities identification, 1:506 Organizational strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organizational structure(s), 1:472–479 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475 and growth constraints, 1:475 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization climate, 2:135 RFID in, 2:415 Outbound spillover rent, 1:331 Outcome expectations, 2:112 Outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 Organization rent, 1:331 Outcome expectations, 2:112 Outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:359 economic gains from, 1:359 and horizontal/vertical movement in value chain, 1:359 on-site model of, 1:358–359		
Organizational strategies for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organizational structure(s), 1:472–479 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475 and formal planning constraints, 1:475 and growth constraints, 1:476–477 impact of, 1:473 and mass customization, 1:422 purpose/function of, 1:473–475 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization climate, 2:135 Outbound spillover rent, 1:331 Outcome expectations, 2:112 Outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 on-site/offshore model of, 1:358–359		
for stimulating innovation, 2:458–459 for work-home interaction, 2:82–84 Organizational structure(s), 1:472–479 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475 and formal planning constraints, 1:475 and growth constraints, 1:476–477 impact of, 1:473 and mass customization, 1:422 purpose/function of, 1:473–475 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organization memory in, 2:462 Organization climate, 2:135 Outcome expectations, 2:112 Outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 or on-site model of, 1:358 Or-site model of, 1:358–359		
for work-home interaction, 2:82–84 Outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing. See also Business process outsourcing BPO and changing, 1:445 and cognitive constraints, 1:475 and growth constraints, 1:476–477 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organization al theories of imitation, 1:401–402 organization climate, 2:135 Outcomes, process vs., 1:497 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 on-site model of, 1:358 on-site/offshore model of, 1:358–359	· ·	
Organizational structure(s), 1:472–479 and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475 and growth constraints, 1:476 and growth constraints, 1:476 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organization theories of imitation, 1:401–402 organization climate, 2:135 Outdoors educational activities, 2:116 Outplacement, 2:117 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 of IT, 1:356–362 motivations for, 1:357 on-site model of, 1:358–359	•	•
and adaptation constraints, 1:477 adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475 and formal planning constraints, 1:475–476 and growth constraints, 1:476–477 impact of, 1:473 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organization altheories of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 of IT, 1:356–362 motivations for, 1:357 on-site model of, 1:358 Or-site/offshore model of, 1:358–359		•
adaptive challenge for, 1:472–473 BPO and changing, 1:445 and cognitive constraints, 1:475 and formal planning constraints, 1:475–476 and growth constraints, 1:476–477 impact of, 1:473 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organization al theories of imitation, 1:401–402 organization climate, 2:135 Outsourcing. See also Business process outsourcing and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 of IT, 1:356–362 motivations for, 1:357 on-site model of, 1:358 on-site/offshore model of, 1:358–359		
BPO and changing, 1:445 and cognitive constraints, 1:475 and formal planning constraints, 1:475—476 and growth constraints, 1:476—477 and mass customization, 1:422 purpose/function of, 1:473—475 reconciling adaptive conflicts in, 1:477—479 of sport organizations, 2:505—506 and strategy formulation constraints, 1:475—476 Organizational theories of imitation, 1:401—402 organization memory in, 2:462 Organization climate, 2:135 and ethical manufacturing, 1:462 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:356—357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357—358 and horizontal/vertical movement in value chain, 1:359 to India, 1:358—363 of IT, 1:356—362 motivations for, 1:357 on-site model of, 1:358 Organization climate, 2:135	•	
and cognitive constraints, 1:475 and formal planning constraints, 1:475–476 and growth constraints, 1:476–477 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 and flexible labor, 2:99 and supply-chain management, 1:410 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 or on-site model of, 1:358 on-site/offshore model of, 1:358–359	•	
and formal planning constraints, 1:475–476 and growth constraints, 1:476–477 impact of, 1:473 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 and supply-chain management, 1:410 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 of IT, 1:356–362 motivations for, 1:357 on-site model of, 1:358 Organization climate, 2:135		G.
and growth constraints, 1:476–477 impact of, 1:473 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 Outsourcing benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 of IT, 1:356–362 motivations for, 1:357 on-site model of, 1:358 on-site/offshore model of, 1:358–359		
impact of, 1:473 and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 benefits from, 1:356–357 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 of IT, 1:356–362 motivations for, 1:357 on-site model of, 1:358 On-site/offshore model of, 1:358–359	· •	** *
and mass customization, 1:422 purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 defined, 1:355 domain specialization in, 1:359 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 of IT, 1:356–362 motivations for, 1:357 on-site model of, 1:358 on-site/offshore model of, 1:358–359		· ·
purpose/function of, 1:473–475 reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 domain specialization in, 1:359 economic gains from, 1:357 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 of IT, 1:356–362 motivations for, 1:357 on-site model of, 1:358 On-site/offshore model of, 1:358–359	± ·	
reconciling adaptive conflicts in, 1:477–479 of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 economic gains from, 1:357–358 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 of IT, 1:356–362 motivations for, 1:357 on-site model of, 1:358 on-site/offshore model of, 1:358–359		
of sport organizations, 2:505–506 and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 and horizontal/vertical movement in value chain, 1:359 to India, 1:358–363 of IT, 1:356–362 motivations for, 1:357 on-site model of, 1:358 on-site/offshore model of, 1:358–359	1 1	*
and strategy formulation constraints, 1:475–476 Organizational theories of imitation, 1:401–402 organization memory in, 2:462 Organization climate, 2:135 on-site/offshore model of, 1:358–359	• •	<u> </u>
Organizational theories of IT, 1:356–362 of imitation, 1:401–402 motivations for, 1:357 organization memory in, 2:462 on-site model of, 1:358 Organization climate, 2:135 on-site/offshore model of, 1:358–359		
of imitation, 1:401–402 motivations for, 1:357 organization memory in, 2:462 on-site model of, 1:358 on-site/offshore model of, 1:358–359	••	
organization memory in, 2: 462 on-site model of, 1: 358 Organization climate, 2: 135 on-site/offshore model of, 1: 358–359		
Organization climate, 2:135 on-site/offshore model of, 1:358–359		
	·	
	•	

Overhead	lead relative wage strategy for, 2:87–88
of creative foundations, 2:514	match relative wage strategy for, 2:88–89
in MNCs vs. Asian companies, 1:234	and strategic compensation management, 2:87
Overweight, 2:103	strategies for, 2:87–89
The Overworked American (Schor), 1:151	Payroll administration, 1: 444
Owens, Jim, 1: 170	Peace Corps, 2:324
Ozeki, C., 2:104	Pearson, Christine, 1:109
Ozminkowski, R. J., 2:107	Peasant villages, 2:252–253
Ozone layer, 1:469	Peer-to-peer virtual environments, 2:17
• *	Peiperl, M. A., 2: 118
Pacific Bell, 1:357, 2:107	Pelletier, K. R., 2: 104
Packaging, 1:288	Penrose, E. T., 1: 327
Packard, David, 2:383	Pension Benefit Guarantee Corporation, 1:171
Pakistan, 1: 145, 224	Pentagon, 1:113
Palepu, K. G., 1: 347	People
Palmisano, Samuel J., 1: 178	and office design, 1:455
Panasonic, 1: 387, 389	and organizational security, 1: 504–505
Pandemic Task Force, 1: 114	People management, 1: 155
Panel Study of Entrepreneurial Dynamics (PSED), 1:5,	Pepsi, 1:405, 2:398
7–8	Perceived distinctiveness, 2: 234
Panic flight, 2: 493	Perception
Pant, S., 1:319	of organizational justice, 1: 223–225
Paper documents, 2: 339–340	process of, 1:221–222
Paper documents, 2.339–340 Paperless office, 1:454	PerfectCommerce, 1:416
Paradigm interplay, 2: 320	Perfect mobility, 1:328
"Paradox of Choice," 1:427	Performance
Paranoia, organizational, 2:231–237	alignment of, 2:218
conceptualizing, 2:231–233	attribution of performance to leaders, 2:302
consequences of, 2:236–237	and business imitation, 1:404–405
and exaggerated perception of conspiracy, 2: 236	and corporate entrepreneurship, 1: 18–19
origins of, 2: 233–236	effects of organization memory on, 2:464–467
and perceived distinctiveness, 2:234	and environmental supply chain management, 1: 290
and sinister attribution error/bias, 2:236	of mergers, 1:346–348
and social interactions, 2:236	and organizational security, 1:502
and social standing, 2:234–236	and political behavior, 2:218
and uncertainty, 2:234–236	and telework, 2:363
Parker, Barbara, 2:324	of work teams, 2:3
Parsons, F., 2: 112	Performance appraisal, in global management, 2:331–332
Participatory leadership style, 2: 274, 486	Performance appraisal systems, 2:117
Partner relationships, 1:318	Performance-based rewards, as HRM best practice,
Partnership-building programs, 2:136	1: 215–217
PARTS framework, 1: 390	Performance evaluation(s)
Part-time employment, 2:174	and career management, 2:116–117
Pasteur, Louis, 1:492	and implicit leadership theories, 2:305
Patent law, 1:36	Performance orientation, 1: 380
Path-goal theory, 2:274	Perkins, Thomas, 2:388
Patient staging areas (PSAs), 2:497	Perlmutter, Howard, 1:180, 380
Patient surge management, 2:496–497	Permanent transfers/promotions, 2:116
Paton, N., 2:105, 107	Perot, Ross, 1:360
Pauchant, Terry, 1:106	Perot Systems, 1:357
Paulson, Henry M., 1:91	Perraton, J., 1: 203
Pay level decision making, 2:86–92	Perrini, Francesco, 1:117, 122
and compensation, components of, 2:90-91	Perrow, C., 2:472, 473, 477
considerations for, 2: 91–92	Perrow, Chales, 1:111
and external salary level determination, 2:89-90	Perry, R. W., 2:494
lag relative wage strategy for, 2:88–89	Persistence. 2:243

Persistent organic pollutants (POPs), 1:121	Physical aging, 2: 132
Personal characteristics, of leaders, 2:273–274	Physical location, and organizational security, 1:506
Personal development, and career management, 2:113	Physical work, 2:402
Personality	Pilo, David, 1:108
and intercultural adaptation, 2:254	Pinder, Craig, 2:183
and organizational misbehavior, 2:223	Pink, D. H., 2: 99
and women management, 1:158–159	Piotrkowski, Chaya S., 2:78
and women managers' success, 1:158–159	Pipeline inventory, 1: 411
Personalization, and mass customization, 1: 423	Place and space strategies for 21st-century organiza-
Personal perspective, 2: 319	tions, 1:451–459
Personal protective equipment (PPE), 2: 498–499	PlanetFeedback.com, 2:18
Personal space, 2:255	Planning
Personal Web use (PWU) monitoring, 2:370–378	in developing countries, 1: 195
and affectivity, 2:375	and globalization, 1:194
fairness of, 2:374	for IIOS, 1: 313, 319
future directions in study of, 2:377–378	Planning horizons, 1:77
group-level effects of, 2:375–376	Platow, Michael, 2:188
organizational-level effects of, 2: 376–377	Playfulness, as creativity/innovation dimension, 2:457
and psychological contract, 2:374–375	Poist, Richard F., 1: 119–121
reactions to, 2: 374–375	Poland
recommendations for, 2:378	and culture, 1:380
and social information processing theory, 2: 372	and entrepreneurship, 1:43
technology for, 2:373–374	and women entrepreneurs, 1:53
as tool for management control, 2: 371–372	Polaroid, 2:57
Personnel management (PM), HRM vs., 1: 214	Policy, and cultural sensitivity, 1: 381–384
Peru, 1: 32, 224	Political behavior, 2: 214–218
Pessemier, W., 2: 494	and ambiguity, 2: 217
Peteraf, M. A., 1:327	and fairness perceptions, 2: 217–218
Peters, T., 2:66	and goal alignment, 2: 217
Petersen, LE., 2: 305, 306, 307	and in-groups, 2:218
Petersen, R. B., 2: 60	macro causes of, 2:214–215
Peterson, G. W., 2: 112, 113, 118	micro causes of, 2: 215–216
Peterson, R. B., 2: 59	mitigation of, 2: 216–218
Peterson, T., 2: 113	and organizational misbehavior, 2: 225
Pfeffer, J., 2: 56, 58, 66, 233, 299	as organizational misbehavior, 2: 225
Pfizer, 1: 362	and performance alignment, 2: 218
Pharmaceutical industry	and rewards alignment, 2: 218
business opportunities in, 1: 294	self-categorization theories, 2: 215–216
outsourcing of R&D for, 1:362	and social identity, 2: 215–216
Philanthropic organization management, 2:510–516	and threat assessment, 2: 216
challenges in, 2: 512–514	and uncertainty, 2: 217
and charity vs. philanthropy, 2: 510–511	Political consumerism, 1: 131
and creative philanthropy, 2: 511	Political imperative, and culture-sensitive global strate-
critical aspects of, 2: 511–512	gies, 1:378
and strategic philanthropy, 2:511	Political organization
trade-offs in, 2: 514–516	as culture division, 2: 251
Philippines	and intercultural adaptation, 2: 253–254
and entrepreneurship, 1: 43	Political rent seeking, 1: 47
HRM practices in, 1:215	Politics, organizational, in management settings. See
manufacturing in, 1:232	Organizational politics, in management settings
McDonald's in, 1:236	Pollution Probe, 1:132 Poly centric mindset 1:180
power distance in, 1:224	Poly-centric mindset, 1:180
and women entrepreneurs, 1: 53	Polycentrism, 1:380
Philipps, Claude, 2: 29	Polzer, J. T., 2:38, 46
Philips, 1: 384, 389 Phillips, Katherine, 2: 146	Poole, M. S., 2:294 Poor physical health 2:104
ZOLIOS KAIDETIDE ZILAD	POOL DOVSICAL DEALIN 7. LOA

Poor Richard's Almanac (Franklin), 1:151	"Preparing for Evil" (Mitroff and Alpaslan), 1:114
Population density, and high technology entrepreneurship,	"Presenteeism," 2:105
1: 34	Pressure tactics, and labor relations, 1:175
Population ecology, and organizational structures, 1:477	Pretexting, 2:383, 386–388
Population growth, 1: 191–192	Prevention, of organizational misbehavior, 2:226, 227
Porter, G., 1:149	"Prevention Makes Common 'Cents," 2:103
Porter, M. E., 1:306, 311, 365	Price, and mass customization, 1:425–426
Porter, Michael, 1:377, 391	PriceGrabber.com, 2:18
Portland General Electric Company, 1:108	PriceWaterhouseCoopers, 1:108
Portugal	Primavera Project Planner (P3), 1:485
and development, 1:191	Priming thoughts, 2: 146
uncertainty avoidance in, 1:224	Pringle, J. K., 2: 118
and women entrepreneurs, 1:53	Prisma Energy, 1:108
Portuguese, as Internet language, 2:392	Prisoners' Dilemma, 1:469
Positive affect (PA), 2:260–261, 263, 264	Privacy, and office design, 1:453–454
Positive behavioral changes, 2:105	Privacy and Freedom (Westin), 2:385
Postcorporate careers, 2:115, 124	Privacy of information. See Information privacy
Postindustrial age, technology and culture in, 2:252–253	Privacy statutes, 2:108
Post-its, 1:37	Private-equity companies (PECs), 1:352
Postmodernist assumptions, 2:427	Private offices, 1:4 54
Postponement, supply-chain, 1:414, 415	"Private politics," 1:127
Postretirement jobs, 2: 137	Private property rights, protection of, 1: 43–46
Poverty	and bureaucrats, 1:45–46
absolute, 1: 96, 97	for intellectual property, 1: 44–45
ambiguity of, 1:95–96	for shareholders, 1:43–44
and entrepreneurship, 1:43	Proactiveness, 1:17
manifestations of, 1:96	Proactive strategies, for organizational security, 1:507
and population, 1:192	Proactivity, and careers, 2:126
relative, 1: 96–98	Problems, 1:111, 496
and working poor, 1:96–98	Probst, Gilbert, 1:109
Poverty alleviation, as corporate issue, 1:95–104	Procedural justice, 1: 223, 226–227
"bottom-of-pyramid" approach, 1:99–100	Procedural justice climate, 1:226, 2:384
business approaches toward, 1:100–102	Process, outcomes vs., 1:497
and codes of conduct, 1:99	Process capital, 2: 402, 403
and labeling, 1:99	Procter & Gamble, 2:18, 107
measurement/implementation of, 1:98–100	and mass customization, 1:427
microcredits, 1:100	and supply-chain management, 1:412
and Millennium Development Goals, 1:97, 98	supply-chain management at, 1:408
origins of, 1: 97	Product design
and societal discontent, 1:97–98	in supply-chain management, 1: 414
specific implementations of, 1:102–104	and Web-based customer knowledge, 2: 19–21
triggering incidents, 1: 97–98	Product development, intangible capital in, 2: 405–408
Powell, Gary, 2: 141–142	Product family, and mass customization, 1: 427
Powell, W. W., 2:292, 293	Product groups
Power distance	and organizational security, 1:505
and culture, 1:380	and Strategy Wheel, 1:370
and fairness perceptions, 1:224	Production, and environmental supply chain management
Power-motivated managers, 2:273	1:286–287
PPP (purchasing power parity), 1: 196–197	Productivity, 2:104, 105
Prahalad, C. K., 1:253, 2:18, 35	in Asia, 1: 234
Prandelli, E., 2: 16, 18, 19	at family-friendly organizations, 2: 178
Precipitating events, 1:14	and office design, 1:455
Predictable surprises, 1: 111	and telework, 2: 363
Preemployment, and organizational misbehavior,	and women managers' success, 1:164
2: 227–228	Product launch, and Web-based customer knowledge,
Preparation, as artistic focus, 1:496	2: 21–22

Purcell, K., 2:97, 99

Product life cycles Purchasing, in environmental supply chain management, and co-opetition, 1:393 1:282, 284–286 and environmental supply chain management, 1:290 Purchasing power parity (PPP), 1:196–197 Product market, and co-opetition, 1:393 Purchasing social responsibility (PSR), 1:121–124 Pure challenge, 2:127 Product recovery, and supply-chain management, 1:412-413 Purpose, and artistic methods, 1:494 **Products** Puumalainen, K., 1:181 imitation of, 1:399 Pygmalion effect, 2:305 in mass customization, 1:423-424 Product stewardship, 1:287 OBE insurance, 1:202 Product testing, and Web-based customer knowledge, Ouackenbush, Chris, 1:107 2:21 Quality movement, 1:467 Ouasi-rents, 1:329 Professional development, 2:116 Profile, of creative foundations, 2:516 Ouiet spaces, 1:454 Profitability Quinn, D. M., 2:305 and diversity, 2:147 Ouota systems, 2:141 and diversity management, 2:147 QWERTY design, 1:305 Project(s) defined, 1:482 Raccagni, D., 2:18 distinguishing work roles/identities/skills in, 1:483 Race singularity/agency in, 1:482-483 and intrinsic motivation, 2:198 Project Management Book of Knowledge (PMBOK), and labor relations, 1:170 1:485 Radbourne, R., 2:488 Project managment, and business process outsourcing, Radical innovation, 1:306, 310, 311 1:448-449 Radio frequency identification. See RFID Project reviews, and outsourcing, 1:449 Railroads, and global projects, 1:484 Property manifestations, of organizational misbehavior, Railway Labor Act in 1926, 1:167 **2:**225-226 Rainbow/PUSH Coalition, 1:172 Proprietary information, 2:380 Rainey, H. G., 2:296 ProQuest database, 2:469 Raisch, Sebastian, 1:109 Prospect bias, 2:277 Ramaswamy, V., 2:18 Prospect theory, **1:**296, 351 Randomness, and artistic methods, 1:491–492 Ranganathan, C., 1:316 Protean-based careers, 2:130 Protean career model, 2:131 Rapid prototyping, 1:494 Protean careers, 2:115, 118, 123-124 Rapid response teams, 2:478 Protected health information (PHI), 2:108 Rational cognitive style, **2:4**52 "Protestant Work Ethic," 1:151 Rationalist discourses, 2:426 Protest organizations, 1:168 Rationality, in strategic decision making, 1:295–296 PSED II, 1:7-8 Rationing game, **1:**411–412 Ravenscraft, D. J., 1:347 Psychological Assessment Resources, 2:112 Psychological contract, **2:**121, 122, 374–375 Ravichandran, T., 1:319 Psychological contracts, 2:122 Rayport, J. F., 2:15 Public Health Service Act (PHSA), 2:108 Reactive cultural theory, 2:151 Public opinion, activist tactics with, 1:131–132 Reactive strategies, for organizational security, 1:507 Public organizations, intrinsic motivation in. See Intrinsic Reagan administration, 1:22, 28 motivation, in public organizations Reagans, R., 2:38, 39 Public perception, and ethical manufacturing, 1:469 Realistic job previews, 2:116 Public policy Realized strategy, **1:**474–475 and costs of environmental solutions, 1:284–285 Real-time data capture, 1:438, 439 and environmental compliance, 1:268-269 Real-time event management, 1:438, 439 Public-private partnership (PPP), 2:294 Real-value merger effects, 1:346–347 Public sector reforms, and business process outsourcing, Reardon, R. C., 2:112, 113, 118 1:445 Reason, J. T., 2:472, 476 Pucik, Vladimir, 2:329 Rebates, 2:108 Punctuated equilibria, 1:18 Reciprocity, as intercultural guideline, 2:257 Recombinant DNA, 1:39–40 Purcell, J., 2:97, 99

Recruitment, 2:116, 166

Red Cross, 2:2	outbound spillover, 1:331
Red tape, 1: 109	relational, 1: 329–330
Reduced instruction-set computing (RISC), 1:341, 342	Rentsch, J. R., 2:48, 49, 51
Redundancy, 2:122	Rentschler, R., 2:484
Reebok, 1:384	Rentschler, R. J., 2: 488
Rees, A., 2:57	Reporting, sustainability in, 1:258
Reevaluation, 2:124	"Repositories of knowledge," 2:114
Regiocentrism, 1:380–381	Reputation, 1: 349–350, 2: 104
Registration, Evaluation, and Authorisation of Chemicals	Request for proposals (RFPs), 1:448
(REACH), 1: 289	Research and development (R&D)
Regret, and merger paradox, 1:350–351	and business imitation, 1:403
Regulatory breaches, 1:501	and co-opetition, 1:394
Rehabilitation Act of 1973, 2:60	cost structures, 1: 310
Reicher, Steve, 2:189	and entrepreneurship, 1:44
Reinforcement stage, 2:124	and global business citizenship, 1:139
Reinhardt, Forest, 1:275	and high technology entrepreneurship, 1:33
Reinventing Organization Development (Bradford and	and interconnected firms, 1:326
Burke), 2: 444	outsourcing of, 1:362, 445, 446, 447
Relational rents, 1:329–330	and radical innovation, 1:310
Relationship management	in strategic alliances, 1:335
and business process outsourcing, 1:448–449	Research projects, 1:335
and global management, 2:330	Resilience, career, 2:125
and mass customization, 1:422	Resilience, entrepreneur. See Entrepreneur resilience
Relationships	Resource-based theories
second-person world of, 2: 319	for ethnic minority entrepreneurship, 2:153–154
and telework, 2:364	of interconnected firms, 1:328–331
Relative absorptive capacity, 1: 329–330	Resource-based view (RBV), 1:294, 295, 297, 327, 365,
Relative poverty, 1:96–98	2: 114
Relative wage strategy, 2:87–89	Resource complementarity, 1:390, 394
Religion	Resource management, 1:476
host culture of, 2:255	Resources
and intercultural adaptation, 2:254	and business imitation, 1:404
Religious holidays, 1:145	commitment of, 1:16
Remote communication, 2:283	and ethical manufacturing, 1:461, 462
Remote leadership, 2:281–289	and organizational emergence, 1:3
characteristics of, 2:285	Resource sharing, in supply-chain integration, 1:436
and collocation, 2:284–285	Resource similarity, and business imitation, 1: 403
and communication quality, 2:283	Responsibility, as intercultural guideline, 2:257
and communication quantity, 2: 283–284	Restriction on Hazardous Substances (ROHS), 1:289
defining, 2: 281–282	Restructuring, in new economy, 2:66–68
and distance, 2: 282–285	Retail sector
effective, 2: 288–289	human resources management in, 2:63
and face-to-face interaction, 2:282–283	and supply-chain management, 1:409
and leadership style, 2:285–288	Retirement, 2:167
media selection/use for, 2:284	and baby boomers, 2:133
suggestions for, 2: 288–289	and early/phased programs, 2:136
tasks of, 2: 284	and mid- and late careers, 2:135–136
theories of, 2:282	stage of, 2: 124
transformational leadership style for, 2:286–288	transition to, 2: 135–136
and trust, 2: 286–288	Returned goods, 1:288
Remote work, 2:351	Return on investment (ROI), 1:433, 2:107–108
Remuneration, 2:114	Revenge, 2: 224
Renault, 1:381	Reverse distribution, 1:288
Rents	Reverse logistics, 1:121
economics, 1:327	in environmental supply chain management,
in interconnected firms, 1:329–331	1:288–289
internal, 1: 329	in supply-chain management, 1:412–413

Revolutionary change, creating, 2:459	Rivalry-based imitation, 1:402–405
Reward philosophy, 1: 16	Roberto, M., 2:475
Rewards, 2:114	Roberts, K., 2:477, 478
alignment of, 2:218	Roberts, Sarah, 1:125
performance-based, 1:215–217	Robertson, Paul, 1:496
and political behavior, 2:218	Robinson, B. E., 1: 150
Reward structures, 2:189	Robinson, P., 2:67
RFID (radio frequency identification), 1:436–439,	Rockefeller Foundation, 1:29
2: 411–421	Rodríguez, J., 1: 197
adoption of, 2: 412, 413	Roethlisberger, F. L., 2:259
for after-sale service, 2:415, 416	Rogers, Carl, 2: 436
applications of, 2: 411–413, 418–421	Roggeband, Conny, 1:135
barcoding vs., 1:438	Rogovsky, Nikolai, 1:379
benefits/drivers of, 1:437–438	Rohm and Hass, 1:362
building business case for, 2: 417–420	Role conflict, 2: 134, 172
cost effectiveness of, 1:439	Role hypothesis, 2:79–80
development of, 2:412	Role models
effectiveness benefits of, 2:416–417	and women management, 1:160–161
efficiency benefits of, 2:416	and women managers' success, 1:160-161
EPC Information Services for, 2:414	Role transitions, for older workers, 2:167
frequencies and read ranges, 2:413–414	Rolls-Royce, 1:432
improving usefulness of, 2:420–421	Romance, workplace, 2:266
for inbound logistics, 2:414–415	Romania, 1: 43
for internal operations, 2:4 15	Rosa, P., 1: 56
justifications for investment in, 2: 416–417	Rosenberg, N., 1: 306
Object Naming Service for, 2:414	Rosenbloom, R., 1:304, 305
for outbound logistics, 2: 415	Rosenthal, B. B., 2:297
real-time data capture with, 1:438, 439	Rosenthal, R., 2: 305
for sales and marketing, 2:415, 416	Ross, L., 2: 304
shrinkage reduced with, 1:439	Roth, K., 1: 182
standards for, 2: 412, 414	Rousseau, Denise, 2:98, 115, 118, 121
strategic benefits of, 2: 417	Rover, 1:382–383
and supply-chain management, 1:414, 415	Rowley, T. J., 1: 128, 129
tag durability of, 1:439	Royal Dutch Shell, 1:103
tag types and sizes, 2:412–413	and activist groups, 1:127
value generated by use of, 2:414-416, 418	culture-sensitive global strategy of, 1:381
visibility with, 1:439	and poverty, 1: 97, 102
Rhinesmith, S. H., 1:182	Royal Mail building, 1:453, 454, 457
"Richness," media, 2: 284	Ruback, R. S., 1:347
Rickard, J., 2: 488	Ruggie, John, 1:464
Right, good vs., 1: 463	Rumelt, R. P., 1: 327
Rights protection. See Private property rights,	Russell, L., 2: 494
protection of	Russia
Rigid thinking, and workaholism, 1:149	and Allied invasion of France/Germany, 1:484
Ring, P., 2: 294	cultural considerations in, 1:382
Risk assessment	and culture, 1:380
of business process outsourcing, 1:447–448	and entrepreneurship, 1:43
and ethical manufacturing, 1:468	and global projects, 1:487
Risk-based storage construct, 2:463	and women entrepreneurs, 1:53
Risk management, and supply-chain management, 1:417	
Risks	S. C. Johnson, 1: 277
business imitation and minimization of, 1:403	Saarenketo, S., 1:181
of innovation, 1: 310	Saba, Tania, 2: 329
taking, 1: 17, 2: 243, 457	Sabotage, as organizational misbehavior, 2:225–226
and women entrepreneurs, 1:54–55	Sabre, Inc., 2: 2, 5, 10
Rival camps, 2:214	Sacerdote, B., 2:95

Sachs, Jeffrey, 1:97	Schein, V. E., 1:162, 2:305
Saenz, D. S., 2: 234	Schelling, T., 1:351
Safety	Schendel, D. E., 1: 311
and ethical manufacturing, 1: 462, 465	Schepers, D. H., 1: 128
intercultural, 2: 258	Scherer, F. M., 1: 347
Safety inventory, 1:411	Schilfgaarde, P., 2:94
St. Louis Area Regional Response System (STARR),	Schmidheiny, Stephan, 1: 255
2:495	Schmidt, Ian, 2: 213
Salancik, G. R., 2: 233, 299	Schoemaker, P., 1:328
Salary, 2:114	School vacation programs, 2: 177
Salary.com, 2: 373	Schuler, R. S., 2:56
Salary level determination, external, 2: 89–90	Schuler, Randall, 1:379
Sales and marketing, RFID in, 2: 415, 416	Schumpeter, Joseph, 1: 23
Saloniemi, A., 2: 98	and competition, 1:306
Sampson, J. P., Jr., 2: 112, 113, 118	and creative destruction, 1: 307
Samsung	and entrepreneur resilience, 1: 60
and co-opetition, 1: 395, 396	and entrepreneurship, 1:42, 44
co-opetition between Sony and, 1:386–390	and high technology entrepreneurship, 1: 33
Sanchez, R., 1: 206	and innovation, 1:306
Sanctions, nongovernmental, 1:264	Schwartz, Shalom, 2: 327
Sanders, W. G., 1: 182	Schyns, B., 2: 98, 305
Sandia National Labs, 2: 147	Scientific management, 1:453
Sandler, Herman, 1:107	Scientism, 2: 427
Sandler O'Neill & Partners, 1:107	Scotland, 1:242
Sandwich generation, 2:133, 175	Scott, Bruce, 1: 473
Santos, J., 2:240	"Screen routine," 1:299
SAP, 1:231	Search engine optimization (SEO), 2: 397
co-opetition in, 1: 384	Sears, 1:421
supply-chain management software from, 1: 414	SEC. See Securities and Exchange Commission
Sarbanes-Oxley Act of 2002	Second career, 2:124
and entrepreneurship, 1:44	Second-person world of relationships, 2: 319
and chirepreneurship, 1.44 and social/civic responsibility, 1:89	Secure in deployment, 1:501
Sarin gas attack (Tokyo, 1995), 2: 497	Securities Act of 1993, 1: 44
SARS, 2:495, 498	Securities and Exchange Commission (SEC), 1:38, 2:388
SAS Institute Inc., 1: 114	and activist groups, 1:130
Satellite-based mobile telephony, 1:485	and entrepreneurship, 1:44
Satellite centers, 2:362	and high technology entrepreneurship, 1:38
Satellite office, 2:355	Securities Exchange Act of 1934, 1: 44
Saturn, 1: 412	Security, hospital, 2: 499
Saudi Arabia, 1: 195	Security, organizational. See Organizational security
Savickas, M. L., 2: 113	Security by design, 1:501
Sawhney, M., 2:16, 18, 19	Security by design, 1:501 Security manager, 1:504–505
Saxenian, A., 2: 100	Security manager, 1: 304–303 Security/stability, s career anchor, 2: 127
Scalability, of virtual environments, 2: 17	Seeber, R. L., 2: 60
Scan and send technologies, 1:304	
	Segars, A. H., 1:315, 317
Scandinavia	Segmentation, and mass customization, 1: 421–422
language clusters in, 1:244	Segregation hypothesis, 2:79
multilingual capabilities in, 1:242	Selection, 1: 299, 2: 116, 266, 331
women managers in, 1:164–165	Self-actualization, 2:194
Scandinavial Airlines (SAS), 1:242–243	Self-aggrandizement, 2:273
Scandura, T. A., 2:245	Self-categorization, 2:234
Scenario studies, 1:507–508	Self-categorization theories, 2:184, 215–216
Schambra, W., 2:515	Self-concept, and implicit leadership theories, 2:303
Scharfstein, D. S., 1: 349, 350	Self-confidence
Schein, E. H., 2: 124	and women management, 1:158
Schein, Edgar, 1:279, 2:127	and women managers' success, 1:158

Self-consciousness, dysphoric, 2: 233–234	Shareholder rights, protection of, 1:43–44
Self-determination, as intrinsic motivation, 2: 194	Shareholder tactics, 1:130–131
Self-efficacy, 1: 63, 2: 49–50, 112	Shareholder value, and mergers, 1:347–348
Self-employed teleworkers, 2: 351–352	Sharp Corporation, 1: 387, 396, 405
Self-esteem, and workaholism, 1:149	Shaw, E., 1: 51
Self-evaluation, 2:385	Sheehy, G., 2: 131
Self-fulfillment, 2:123	Sheldon, P., 2: 95
Self-interest dilemma, 2:8	Shell Oil. See Royal Dutch Shell
and globalization, 2:8	Shepard, Herbert, 2:446
and virtual work teams, 2:10	Sherman Antitrust Act of 1890, 1:464
and work teams, 2:5–6	Sherry, 2: 126
Self-interests, and women management, 1:159	Shore, J. E., 2: 117, 118
Self-memory, 2:340	Short-term wins, and change leadership, 2:279
Self-set goals, and non-motivation, 2:203–210	Shrinkage, 1: 438, 439
case study, 2: 204–208	Shrivastava, Paul, 1:106, 111
and conflicts with needs, 2:205–206	Sicca, L. M., 2: 483, 484
and conflicts with other goals, 2:205	Siemens Corporation, 1: 242, 243, 362
and external conditions, 2:207–208	Siferd, Sue P., 1: 119
and joy, 2: 208–209	Sikkink, K., 1: 128
and motivation, 2:209–210	Silent Spring (Rachel Carson), 1:272, 461
and SMARTCH goals, 2:204	Silicon Valley, 1: 37–38, 2: 99, 153–155
and volition, 2: 206–207	Silos, 2: 343, 344
Selve, 1: 421	Simatupang, T. M., 1:317
Semi-autonomous teams, 2:96	Similarity-attraction paradigm, 2:45
Semiconductor manufacturing, 1:232	Simola, Sheldene, 1:112
Sen, Sankar, 1:117	Simpson, P., 2: 135
Senge, Peter, 2: 432	Simulated sensemaking processes, 2:474
Seniority-based pay (SBP), 2:67	Simulations, and organizational security, 1:507
Sensemaking, 1: 183, 2: 474–475	Simultaneous engineering (SE), 1:432
Sense of urgency, 2: 278–279	Singapore
Sensitivity, as intercultural guideline, 2: 257	as airline hub, 1: 444–445
Sensitivity training, 2: 145	and culture, 1:380
September 11, 2001, terrorist attacks, 2: 493–496	demographics, 1:213
and organizational crisis management, 1: 106, 107	HRM practices in, 1:215
and uncertainty, 1: 200, 201	manufacturing in, 1: 232
and workaholism, 1:153	telecommuters in, 2:175
Serendipitous communications, 2:284	uncertainty avoidance in, 1:225
Serendipity, 1: 496–497	and women entrepreneurs, 1:53
"Service and flow" economy, 1: 467	Singh, H., 1: 325
Service Employees International Union (SEIU),	Sinister attribution error, 2: 236
1: 169, 172	Six Sigma, 2: 2, 5
Service groups, and organizational security, 1: 506	Skandia value scheme, 2:409
Service level agreement (SLA), 1: 448	Skelcher, C., 2: 293
Service parts inventories, 1: 412	Skill development, as career strategy, 2:125
Service quality, 1:234–236	Skilling, Jeffrey, 1:108
Services, imitation of, 1: 399	Skills, on global projects, 1:483
Service work positions, 2:135	Skoll Foundation, 1:26
Sewell, G., 2: 41	S-LCD, 1: 387–390
Sexual harassment, 2:224, 373	Sloan, Alfred, 1:377
Shaffer, K., 2: 515	Slovak Republic, 1:43
Shame, 2: 264	Slovenia, 1:53
Shamir, B., 2: 304	Small- and medium-sized enterprises (SMEs)
Shapiro, C., 1: 304, 306, 308	characteristics of, 1: 74
Shapiro, D. L., 2: 37	corporate social responsibility in, 1:125
Shared identity, 2:188	defined, 1:73
Shareholder proxy voting, 1:130	environmental supply chain management in. 1:2

outsourcing by, 1:444	and intercultural adaptation, 2:253
strategic planning in. See Strategic planning, in new	Social identity, 2: 184–185, 190
ventures/young SMEs	and entrepreneur resilience, 1:65
and women entrepreneurs, 1:56, 57	of global teams, 2:26–27
Small Business Administration (SBA), 1:44, 57	and political behavior, 2: 215–216
"Small-world phenomenon," 1:203	Social identity theory (SIT), 2: 45, 184, 215–216
SMART, 2:204	and global management, 2:329–330
Smart, Carolyne, 1:110	and implicit leadership theories, 2: 303
SMARTCH, 2 :204, 208	Social information processing theory, 2: 372
Smith, Adam, 1:88, 2:508	Social interactions, and paranoia, 2:236
Smith, K. K., 2:297	Social interchange theory, 2: 84
Smith-Doerr, L., 2: 292	Socialization, 2:116, 337
SmithKline Beecham, 1:187	and intrinsic motivation, 2:199
Smoking, 2: 105	and organizational misbehavior, 2:228
Snell, S. A., 2: 37	Social knowledge
Snook, S. A., 2:473, 475–477	access to, 2:17
Snow, C. C., 2: 37	customer-generated, 2:17
Snyder, M., 2:489	in virtual environments, 2: 17
Social, ethical, and environmental disclosure (SEED),	Social learning, and business imitation, 1:400
1:258	Social loafing, 2: 190, 224–225
Social Accountability 8000 (SA8000), 1: 117, 118,	Socially responsible investment (SRI), 1: 130
124, 465	Social movements, 1:172
Social alliances, as activist tactic, 1: 132	Social networks
Social and civic responsibility, 1:84–93	and business imitation, 1:402
in business organizations, 1: 88–90	and co-opetition, 1:392
defined, 1: 85–86	entrepreneurship and, 1:35
fostering, 1: 92–93	Social organization, as culture division, 2: 251
future prospects for, 1: 91–92	Social orientation, and entrepreneur resilience, 1:64–65
origins of, in United States, 1:86–88	Social psychology, 1: 179
in 21st century, 1: 90–91	Social responsibility (SR)
urgency of, 1: 84–85	and environmentalism, 1:275–276
Social capital, 1: 4, 2: 218, 404–405	and ethical manufacturing, 1: 464
in customer value development, 2:4 03	in management of supply chains. See Corporate social
deficiencies in, 2: 407	responsibility, in supply chain management
national industry impacted by, 1: 377	Social retrieval construct, and organization memory,
payoffs of, 2:408	2: 463, 464
in successful product development, 2:406	Social Sciences and Humanities Research Council of
Social categorization theory, 2: 45	Canada (SSHRC), 1: 343
Social cognitive career theory, 2:1 12	Social Security, 2:136
Social cognitive theory, 2:76	Social skills, and entrepreneur resilience, 1:65
Social cohorts, and work motivation, 2: 162	Social standing, and paranoia, 2: 234–236
Social construction and information processing, 2: 302	Social Value Proposition, 1:25
Social context cues, 2:283	Societal discontent, and poverty alleviation, 1:97–98
"Social contract" theory, 1:88	Society for Human Resource Management (SHRM),
Social engineering, and organizational security, 1: 508	2:105, 224
Social enterprise, 1:28–30	Sociological theory, and business imitation, 1: 402
•	· ·
Social Enterprise Alliance, 1:22, 28	Softlifting, 2:373
Social entrepreneurship, 1:22–31	Sole, D., 2:40
conventional/commercial entrepreneurship vs., 1:25–26	Solidarity charters, 1:169
definitions of, 1:24	Soltis, M. J., 2:108
and entrepreneurship concept, 1:23–24	Solution space, and mass customization, 1: 426–427
and macro perspective, 1:26–27	Sony
and micro perspective, 1:27–28	and co-opetition, 1:395, 396
and social enterprise, 1:28–30	co-opetition between Samsung and, 1:386–390
Social groupings	Sony Walkman, 1:37
host culture of, 2:255	Soule, S. A., 1: 132

Source-based perspectives	Standard operating policies (SOPs), 2:62
critiques of, 2: 195–196	Stanford University, 1:37
for intrinsic motivation, 2: 195–196	Staples, Jeffrey, 1:113
Sourcing	Starbucks, 1:476
ethical, 1: 124	Start-up issues. See Organizational emergence
in supply-chain management, 1:416	Start-up teams, 1:4–5
South Africa, 1: 144, 380, 2: 329	Statement of work (SOW), 1:448
South Korea	The State of the Nation (Bok), 1:92
co-opetition in, 1: 387	State-owned enterprises (SOEs), 1:45
and culture, 1:380	State University of New York at Buffalo, 2:457
and high technology entrepreneurship, 1:32	Statistical models, for forecasting/inventory planning,
HRM practices in, 1: 215	1: 411
and Japan, 1: 217	Steele, C. M., 2:305
management training in, 1:217	Steelworkers Union (USW), 1:168, 172, 174
manufacturing in, 1:232	Steen, J., 1:203, 206
R&D spending in, 1:231	Stein, J. C., 1:349, 350
Southwest Airlines, 2:67	Stephan, C. W., 2:235
Space	Stephan, W. G., 2: 235
design of. See Office space	Stereotype threat, 1:163
and terrorism, 1: 205–206	Stereotyping
Space Shuttle Columbia, 1:108	age and aging, 2: 164–166
Spain	of managers, 1: 162–163
Asian colonization/occupation by, 1:214	Stern, Eric, 1: 112
and development, 1:191	Stern, Nicholas, 1:85
and terrorism, 1: 200–201	Sterns, H.L., 2: 131
and women entrepreneurs, 1:53	Stewart, B., 2:508
Spanish, as Internet language, 2:392	Stimulation, as intrinsic motivation, 2:194
Spatial separation, and co-opetition, 1:393, 395	Stochastic inventory models, 1:411, 413
Specialist spaces and facilities, design of, 1:453	Stockholders, in arts organizations, 2:48–4485
Spector, Paul, 2:264	Stock markets, 1:202
Speculators, demise of Asian, 1:231–232	Stone, K. V. W., 2:100
Spencer, S., 2: 305	Stopford, John, 1:377
Spillover rents, outbound, 1:331	Storrie, D., 2: 97
Spirtual purpose, 2:127	Stover, Dawn, 1:108
Spokane, A. R., 2: 113	Stradonitz, August Kekule von, 1:497
Spoken language, host culture of, 2:255	Strategic advantages, exploiting, 2:459
Sponsorship, as political tactic, 2: 213	Strategic alliances
Sport and Recreation New Zealand (SPARC), 2:503–504	and culture, 1:382–383
Sport organization management, 2:501–509	development. See Development alliances
consumer behavior, 2:502–503	Strategic candidates, 2:214
cultures, sporting, 2:506–508	Strategic capabilities, and global mind-set, 1:184–185
governance, 2:508	Strategic choice process, 1:298–300
government relations, 2:503–504	Strategic compensation management, 2:87
human resource management, 2:506	Strategic decision making, 1:294–300
organizational structure, 2:505–506	choice process in, 1:298–300
regulating competitive balance, 2:504–505	components of, 1: 296–297
strategic management, 2:505	definitions, 1: 296–297
Sridharan, R., 1: 317	and explicit decision competence, 1:297–298
Srinivasan, V., 2:21	future research, directions for, 1:300
Stable environments, 1:19	higher-level system of, 1:297
Stable solution space, and mass customization, 1:426–427	and rationality, 1:295–296
Staffing, 2: 115–116	and tacit decision competence, 1: 298
and career management, 2: 115–116	and uncertainty, 1:295–296
in developing countries, 1: 195	Strategic decision making, in arts organizations,
Staffing systems, 2: 115	2: 487–488
Stakeholders, 1:139	Strategic intent, and organizational structures, 1:474

Strategic management, 1:307	relating company skills/infrastructure to performance
of multinational firms, 2:35–37	gaps (step 4), 1: 370, 372
in sport organizations, 2:505	understanding achieved performance (step 3),
and sustainability, 1:253–254	1: 370, 371
Strategic National Stockpile (SNS), 2:497	understanding market requirements (step 2),
Strategic orientation, 1:16	1: 370, 371
Strategic perspectives, 1:180	understanding product groups/defining competitive
Strategic philanthropy, 2:5 11	criteria (step 1), 1: 370
Strategic planning	Stravinsky, Igor, 1:492
in creative foundations, 2: 514	Stress
formal, 1: 475–476	and emotions, 2:265
nature of, 1: 74–75	and office design, 1:454, 456
Strategic planning, in new ventures/young SMEs,	and telework, 2:362
1: 73–80	and work-family balance, 2:133
benefits of, 1:79	Stress crossover, 2:78
and characteristics of SMEs, 1:74	Stressors, 2:134
and control, 1:78	Stress spillover, 2:78
and core competencies, 1:77	Strikes, 1:168, 171, 175
elements of, 1:77–78	Stroh, L. K., 2:117
entrepreneur's role in, 1:75	Structural advantage theory, 2:152
formal, 1: 77–78	Structural ambidexterity, 1:478
goals/objectives, 1:77	Structural causes of failures, 2: 472–473
large enterprises, compared with, 1: 78–79	Structural disadvantage theory, 2:151–152
and nature of strategic planning, 1: 74–75	Structural theories, for ethnic minority entrepreneurship,
need for, 1: 73–74	2: 151–152
new ventures, 1:76	Structure
and planning horizons, 1:77	and office design, 1:455
reasons against, 1:75–76	and organizational security, 1:505
techniques for, 1:78	Stukas, A. A., 2:489
visionary strategy conception, 1: 77	Sturges, J., 2: 111
young SMEs, 1: 76–77	Subcontracting, and flexible labor, 2:99
Strategic renewal, 1:13	Subgroups, and conflict management, 2:45
Strategic techniques, for young SMEs, 1:78	Subich, L. M., 2: 131
Strategy(-ies)	Subjectivity, first-person world of, 2: 319
and corporate entrepreneurship, 1:15	Subsidiaries, cultural considerations in, 1:381–382
cultural. See Cultural strategy(-ies)	Substance abuse, as organizational misbehavior,
evolution of modern, 1:376–378	2: 223–224
global mind-set as, 1:181–182	Subtle practices, 1:123
organizational structure and constraints on formulation	Success
of, 1: 475–476	career, 2: 121–122
Strategy formulation constraints, 1: 475–476	defined, 1:6
Strategy formulation in SMEs, 1: 74–76	of women managers. See Women managers' success
Strategy Wheel, 1:368–373	Succession planning, 2:116
data mining (phase 1), 1: 369	Sullivan, S. E., 2: 126, 127
defining skills/infrastructure to change (step 9), 1: 373	Sundelius, Bengt, 1:112
exploring impact of moving downstream boundary	Sun Microsystems, 2:19
(step 6), 1: 372	and multilateral alliances, 1:341, 342
exploring impact of moving upstream boundary (step	and open standards, 1:307
5), 1:372	and organizational crisis management, 1: 114
exploring impact of newly prioritized skills/infrastruc-	Super, D. E., 2: 131
ture (step 8), 1: 372–373	Superfund Amendments and Reauthorization (SARA),
functions/data required for stages of, 1: 370	2: 492
illustration of, 1: 369	Supplier interfaces, and organizational security, 1:5 01
prioritization of downstream skills/infrastructure,	Supplier management, in supply-chain management,
1:372	1:416
process (phase 2), 1: 369–373	Suppliers, and alliance design, 1: 340
* NE //	· · · · · · · · · · · · · · · · · · ·

Supply chain(s)	in reporting, 1:258 and strategic management, 1:253–254
defined, 1:281–282	in supply chain management, 1:256
extended enterprise applications in, 1:431–440	
schematic of, 1: 409	Sustainable development, 1:116
Supply-chain integration, 1:435, 436	Sustainable packaging, 1:121
Supply-chain management (SCM), 1:408–418	Sustainable supply chain management (SCM), 1:117, 118
components of, 1: 410–417	Sustainable warehousing, 1:121
corporate social responsibility in. See Corporate so-	Sutcliffe, K., 2: 476, 477
cial responsibility, in supply chain management	Sutton, R., 2: 16
defined, 1: 281–282	Sweatshops, 1:135
environmental. See Environmental supply chain	Sweden
management	and culture, 1:380
global issues in, 1: 416–417	and development, 1:191
information/electronic mediated environments in,	language issues in, 1:243, 244
1: 414–415	uncertainty avoidance in, 1:225
inventory/forecasting in, 1:410-411	and women managers, 1:165
location in, 1:413	Swiss Bank Corporation, 1:357
marketing/channel restructuring in, 1:411–412	Switching costs, 1: 310
metrics/incentives in, 1:415–416	Switzerland
outsourcing/logistics alliances, 1:414	and activist groups, 1:135
product design/new product introduction in, 1: 414	and culture, 1:380
reverse logistics/green issues in, 1: 412–413	and development, 1: 191
RFID for, 1: 437–439	SWOT analysis, 1: 77, 78, 79
service/aftersales support in, 1: 412	Symbols, and intercultural adaptation, 2: 254
sourcing/supplier management in, 1:416	Synthesis, and career self-management strategies, 2:114
sustainability in, 1:256	Systems approach
transportation/logistics in, 1: 413–414	to creativity, 2: 452–453
"Supply-chain thinking," 1:414	to office design, 1:455
Supply side, and mass customization, 1: 422	<u> </u>
	Systems theory, creativity in, 2: 452–453
Support groups, 2:145	System 360, 1: 33
Supportive alliances, as career strategy, 2: 125	SYSTRAN, 2: 396
Surveillance, 2:371	TI 1 ' ' D N 4 10
Survivor syndrome, 2: 66, 493	Tabrizi, B. N., 2: 19
Suspicion, 2: 231, 232	Tacit decision competence, 1:298
Sustainability, 1:250–259	Tacit knowledge, and office design, 1:453
in accounting, 1:258	Taiwan
and culture, 1:255–256	HRM practices in, 1:215
in distribution management, 1:257	immigrant entrepreneurs from, 2:150
and environmentalism, 1:275–276	manufacturing in, 1:232
environmental limits in, 1:251–252	outsourcing from, 1:445
equity factor in, 1:251	Tajfel, Henri, 2: 45, 184
and ethical manufacturing, 1:465	Talent management, in global management, 2:332
futurity factor in, 1:251	Talent pool
and global environmentalism, 1:252	and business process outsourcing, 1:445
in human resources management, 1:258	women managers in, 1:164
and industrial ecology, 1:256	Tannen, Deborah, 1:159
and leadership, 1:255	Target, 2: 413
in logistics, 1:257	Task(s)
management dimensions of, 1:257–259	additive, 2:25
in management/information systems, 1:257–258	compensatory, 2:25
in marketing, 1: 258–259	conjunctive, 2: 25
operational dimensions of, 1:256–257	discretionary, 2:25
in operations management, 1: 256	disjunctive, 2: 25
organizational dimensions of, 1: 254–256	and leadership, 2: 284
principle of, 1: 251–253	and office design, 1: 455
progress toward, 1:259	Task-adapted Web sites, 2: 344–345

Task broadening, and flexible labor, 2:96	and IIOS, 1: 316, 318, 319
Task complexity, 2: 25	and intercultural adaptation, 2:253
Task conflict, 2:146	and Internet-based interorganizational systems, 1: 316
Task enrichment, and flexible labor, 2:96	levels of, 2: 252–253
Task environment, and organizational security, 1:503	network effects of, 1:304
Task-level antecedents, of organizational misbehavior,	and office design, 1:455, 457
2: 223	and social/civic responsibility, 1: 84–85
Task-oriented style, 1:160	and supply-chain management, 1: 410
Task performance, effects of organization memory on,	and uncertainty, 1: 310–311
2: 464–467	and workaholism, 1: 153–154
Task-related expertise, 2: 133	Technology development zones (TDZs), 1:38–39
Task rotation, 2:96	Technology entrepreneurship. See High technology
Tata, 1: 190	entrepreneurship
Tate, G., 1:349	Telecommuting, 2: 175, 351, 362
Tavistock Institute of Human Relations, 2: 440, 446	Telephone, 1: 485
Taxonomies, 2:345	Telephone monitoring, 2: 381
Taylor, E. A., 2: 242, 244	Telework, 2:351, 361–369
Taylor, Frederick, 2: 193, 259, 370	factors in growth of, 2: 361
Taylor, S., 1:182–185, 188	forms of, 2: 362
Taylor, S. E., 2: 234	negative impacts on individuals, 2: 363–364
Teachers, as change agents, 2: 432	negative impacts on organizations, 2:365–366
Team-based organizations, and organizational security,	positive impacts on individuals, 2: 362–363
1:504	positive impacts on organizations, 2: 364–365
Team cognition, 2: 31–32	trade-offs in, 2: 362
Team Coordination Training (TCT), 2: 31	understanding impact of, 2: 366–368
Teams. See also Entrepreneurial teams; Global teams,	Telework office, 2:355
coordination in; Transnational teams, in knowl-	Telling leadership style, 2: 274
edge-intensive organizations; Work teams	Tempered radicals, 2:433
and artistic methods, 1:491, 493	Temporal boundaries, 2:47–28
as change agents, 2:430–431	Temporal soundaries, 2.27–28 Temporal separation, 1:392–393
CPS process in, 2:4 54–455	Temp work agencies (TWA), 2: 97
and entrepreneur resilience, 1:65–66	Tenneco, 2:107
of entrepreneurs, 1:35	Tenure, 2: 107
start-up, 1:4–5	Termination, of older workers, 2:1 67
Teamsters Union (IBT), 1: 168, 169	
Teamwork	Terrorism, 1:201. See also Hospital planning for weap ons of mass destruction incidents
in creative foundations, 2: 516	
and organizational security, 1:505	and organizational crisis management, 1: 113
Technical competencies, as career anchor, 2: 127	and outsourcing, 1:449
Techno-addicts (techno-philias), 1:153	Terrorism-induced uncertainty, 1:200–207
Technological convergence, 1:393–394	and business management, 1: 201–202
	and changing international political economy, 1: 204–
Technological cultural change, 2:251–252	205
Technological developments, and transfer of HRM best	and interfirm arrangements, 1:202–204
practices, 1:212 Technological difficulties, with multilingual a commerce	managing in environment of, 1:206–207
Technological difficulties, with multilingual e-commerce	systemic effects resulting from perceptions of, 1:204
Web sites, 2:394	time/space affected by, 1:205–206
Technological infrastructure, and office design, 1: 454	Texaco, 1:381
Technological uncertainty, and radical innovation,	Texas Instruments, 1:33
1:310–311	T-group training, 2: 439
Technology(-ies), 2:133	Thailand
and business process outsourcing, 1:445	HRM practices in, 1:215
and cultural change, 2:251–253	manufacturing in, 1:232
as culture division, 2:251	and poverty, 1:96
destructive, 1:139	state intervention in, 1:218
and ecological footprint, 1:465	t'Hart, Paul, 1:112
global sales force and, 2:350	Thematic Apperception Test (TAT), 2:206

Theory of Planned Behavior, 2:373	for diversity, 2: 144–145
Theory X, 1: 195–196	and global mind-set, 1:186–187
Third-party logistics providers (3PLs), 2: 418–419	in intercultural communication, 2:255–258
"Third spaces," 1:456	for older workers, 2:166–167
Third workplaces, 2:357–358	and organizational security, 1:501, 504
Thomas, A., 1: 194	for philanthropic foundation work, 2: 512
Thomas, Roosevelt, 2: 141, 142	Trait research, 1:3–4
Thomas Miller (company), 1: 455	Traits
Thomke, S. H., 2: 20	emotional, 2: 261
Thompson, Walter, 1: 110	of leadership, 2: 273–274
Thornthwaite, L., 2:95	Transactional leadership, 2: 274, 486
Threat assessments, and political behavior, 2: 216	Transaction theory, 1: 365
Threat-rigidity bias, 2: 277–278	Transformational leadership, 1: 160, 2: 274, 286–288, 486
3M Company, 1:256, 267, 381, 382, 383, 2:57	Transformers, 2: 136
360-degree feedback, 2: 117	TranslateNow!, 2:396
Three Mile Island nuclear power plant accident,	Translators, 1: 245–246
2:471, 472	Transnational organizational forms, 2: 325
Throughput, 1: 505	Transnational teams, in knowledge-intensive
Tight coupling, and organization development/change,	organizations, 2:34–42. See also Global teams,
2:472	coordination in
Time	external perspectives on, 2: 39–40
	future directions for, 2: 41–42
and change agency, 2: 429	
commute, 2:362	internal perspectives on, 2:37–39
and co-opetition, 1:395	knowledge acquisition/application in, 2:40–41
as creativity/innovation dimension, 2: 457	perspectives on, 2: 37–40
global sales force and, 2:349	and strategic management theory, 2:35–37
and terrorism, 1:205–206	Transparency International, 1:196
Tipping points, 1:304	Transportation, in supply-chain management, 1: 413–414
"Tit for Tat," 1: 469	Transportation technologies, and global projects, 1:484
Tjosvold, D., 2:47, 48, 51	Treasury Department, 2:373
Tobacco use, 2:105	Triandis, Harry, 1: 380, 2: 327
The Tonight Show, 1:111	Trichotomy decision-process morphology model, 1: 299
Toolkits, 2:20	Trigger agreement, 1:173
Torka, N., 2:94, 98	Triggering events, and poverty alleviation, 1:97–98
Torrance Tests of Creative Thinking, 2:455	Trilogy (company), 1: 494
Toshiba, 1: 384	Triple bottom-line accounting (3BL or TBL), 1:464
Total Entrepreneurial Activity (TEA), 1:53, 58	Triple bottom line approach, 1:117
Total quality environmental management (TQEM), 1:257,	Trist, Eric, 2: 446
282, 286, 287	Trompenaars, Fons, 1: 380, 2: 328
Total quality management (TQM), 1:257, 286, 466, 2:4	"True reasoning," 2:112
Tough Choices (Fiorina), 2:389	Trust, 2: 384–385
Toxic Release Inventory (TRI), 1:268	as creativity/innovation dimension, 2:457
Toxins, workplace, 2:382	development of, 2: 231–232
Toyota, 1: 236, 362, 2: 403–404	in remote leadership, 2: 286–288
Toyota Production System, 1:404, 2:478	Tsakalotos, E., 1:346
Tracking, with RFID, 1:437–439	Tulane University, 1:107
Trade Act of 1974, 2: 60	Turkey, 1: 32, 53
Trade agreements, and outsourcing, 1: 444	Turner, B., 2: 473
Trade openness, and entrepreneurial creation, 1: 48	Turner, J., 2: 45, 234
Trade unions. See Unions	Turner, John, 2: 184, 188
Trading process networks, 1: 416	Turnover. See Employee turnover
TRADOS, 2:396	Tushman, M., 2:39
"Tragedy of the commons," 1: 469	
• •	Tushman, M. L., 1:307, 2:514
Training, 2:116, 133	Tversky, A., 1: 350, 351
and career management, 2: 116	Tyler, T. R., 2:235
cross-cultural, 1:186	Tylor, E. B., 2: 250

UBS Warburg, 1:108	emissions control in, 1:466
Uchitelle, Louis, 1:89	and English Channel Project, 1:484
UCLA, 2: 446	ethnic/minirity enterprises in, 2:155, 156
Uhl-Bien, M., 2:245	and flexible accumulation, 1:205
UK Post Office, 1:453	individualism in, 1:224
Ukraine, 1: 42, 43	and mergers, 1:346
Ulrich, D., 2:63	middle management changes in, 2:68–73
Ultrahigh frequency (UHF), 2:413, 414	new economy, managing in, 2:65–73
Uncertainty	perceived fairness in, 1:225, 226
about social standing, 2:234–236	performance effectiveness in, 2: 331
and business imitation, 1:403, 404	restructuring in, 2: 66–68
in creative foundations, 2:515–516	and September 11, 2001, terrorist attacks, 1:204
and mass customization, 1:426	sport regulation in, 2: 504
and paranoia, 2: 234–236	sports organizations in, 2:503
and political behavior, 2: 217	telecommuters in, 2:175
and rationality, 1:295–296	and terrorism, 1:201
in strategic decision making, 1:295	wage rates in, 1:356
and supply-chain management, 1: 410	waste management in, 1: 466
technological, 1: 310–311	and women entrepreneurs, 1:53, 57
terrorism-induced. See Terrorism-induced	United Nations (UN)
uncertainty	and corporate social responsibility, 1:464
Uncertainty avoidance	Declaration of Human Rights, 1: 140, 145
and culture, 1: 379, 380	Global Compact, 1:104, 118, 145
and fairness perceptions, 1:224–225	and LDCs, 1: 191–193
UN Convention on Human Rights, 1:465	and population growth, 1: 191
Undercapitalization, of women-owned businesses, 1:56	United States, 2: 96, 103, 104, 110, 114, 115, 266
Undercommunication, and change leadership, 2: 279	and activist groups, 1: 127, 130, 134
Underdeveloped countries. See LDCs	adn global GDP, 1: 230
Understanding	aging in, 2: 160, 164–165
common, 2: 337	and Allied invasion of France/Germany, 1: 484
as intercultural guideline, 2: 257	Asian colonization/occupation by, 1: 214
UNESCO, 2: 337	civic responsibility in, 1: 86–93
Ungson, G. R., 2: 462	and co-opetition, 1: 391
Unicode, 2: 397	corporate social responsibility in, 1: 464
Uniform Code Council, 2: 412	cost saving from outsourcing from, 1:357–358
UNI (Union Network International) Global Union, 1: 173	and culture, 1:380
Unilever, 1: 381, 383	and development, 1: 191
Union Carbide, 1: 276, 2: 446	environmental compliance in, 1: 262, 263
Unionism, business, 1:168	ethical manufacturing in, 1: 467
Union organizing, 1:172–173	ethnic/minirity enterprises in, 2: 155
Union Pacific Railroad, 2:107	fashion industry in, 1:485
Unions, 2: 108, 122, 148	and flexible accumulation, 1:205
American, 1: 168	and global business citizenship, 1: 144
structure/focus of, 1: 172	and globalization, 1: 195, 196
in 2025, 1: 172–173	and high technology entrepreneurship, 1:32, 34
Uniqueness, need for, 1: 424	individualism in, 1:224
United Auto Workers (UAW), 1: 168, 172, 2: 104	innovation system in, 1: 35–37
United Brotherhood of Carpenters and Jointers (UBC),	and international travelers, 1:207
1:168, 169	and job losses, 2:135
United Farm Workers (UFW), 1: 169	and labor relations, 1: 167–170, 173, 175
United Kingdom, 2:97	labor relations in, 1:167–168
aging in, 2:160, 165	masculine/feminine roles in society, 1: 224
and Allied invasion of France/Germany, 1:484	and mergers, 1:346, 347, 352–353
corporate social responsibility in, 1:464	middle management changes in, 2:68–73
and culture, 1:380	minority groups in, 2:151
and development, 1:191	new economy, managing in, 2:65–73

and organizational crisis management, 1: 109, 113	Value appropriation, and co-opetition, 1:394, 395
origins of social and civic responsibility in, 1:86–88	Value chain
perceived fairness in, 1:225, 226	and co-opetition, 1:393
performance effectiveness in, 2: 331	outsourcing and horizontal/vertical movement in, 1:359
power distance in, 1:224	Value chain model, limitations of, 1:365
restructuring in, 2:66–68	Value net, 1: 390
security breaches in, 1:501	Values (ethical)
uncertainty avoidance in, 1:225	cross-cultural, 2: 327–28
wage rates in, 1:356	and global business citizenship, 1:145
and women entrepreneurs, 1:53, 54	humanistic, and organization development, 2:446–447
and women management, 1:158, 160–161, 163, 164	and intercultural adaptation, 2:254
and workaholism, 1:151	in organization development, 2:436–437, 441–442
United Technologies, 1:381	Value studies, 2: 327–328
UNITE-HERE, 1:169	Valuing, and career self-management strategies, 2:114
Universal education, 1:48	Vanable, P. A., 2: 232
Universal precautions, 2: 498	Vance, Charles, 1:186
Universal principles approach, to global business citizen-	Vandalism, as organizational misbehavior, 2:225–226
ship, 1: 143	Van Der Vegt, G. S., 2: 38
Universities, 2: 171, 172	Van de Ven, A. H., 2: 294
University entrepreneurship, 1:36–37	Van de Vliert, E., 2:44
University of California, San Francisco, 1:39	Vangen, S., 2:295, 296
University of California at Berkeley, 1:37	Van Leeuwen, M. J., 2: 98
University of California at Irvine, 1:37	Van Velzen, M., 2:98
University of California at San Francisco, 1:39	Vaughan, D., 2: 473–474, 475
University of Lund, 2:457	VCRs, 1:305, 399, 404
UNIX firms, 1: 342	Veiga, J. F., 2: 58
UN MIllennium Goals, 1:465	Vendor assessment, for business process outsourcing,
"Up-or-out," 2: 134	1:448
Upstream boundary, 1:372	Vendor-managed inventory (VMI), 1: 412
Urban, G. L., 2: 19, 21	Vendor profile analysis (VPA), 1: 285
Urry, J., 1: 205	Vendor selection, in environmental supply chain manage-
U.S. Air Force, 2: 342–343	ment, 1:285
U.S. Air Force (USAF), 2:105	Venezuela
U.S. Bill of Rights, 1:140	collectivism in, 1: 224
U.S. Bureau of Labor Statistics, 1:170	and culture, 1:380
U.S. Constitution, 1:140	masculine/feminine roles in society, 1: 224
U.S. Department of Defense, 2: 413	power distance in, 1:224
and high technology entrepreneurship, 1:36	Venturing, 1:13
RFIDs used by, 1: 437	Verner, J. N., 1: 316
· · · · · · · · · · · · · · · · · · ·	
U.S. Department of Health and Human Services (HHS),	Verona, G., 2: 16, 18
2:103	Vertical alliance design, 1:340
U.S. Department of Homeland Security (DHS), 2:494,	Vertical co-opetition, 1:391, 392
495–496	Vertinsky, Ilan, 1:110
U.S. Department of Justice, 1:304	Very Large-Scale Integrated (VLSI) Technology Research
U.S. Department of Labor, 1: 96, 2: 114, 147	Project, 1: 386–389
U.S. Office of Scientific Research and Development,	VHS, 1:305
1:484	Video monitoring, 2:381
U.S. Supreme Court, 2:61	Video surveillance, 2: 371
U.S. workforce, 2:133	Vietnam
US Airways, 1: 174	HRM practices in, 1:215
Usher, A. P., 1: 306	lifetime employment in, 1: 217
	manufacturing in, 1:230, 232
Vahtera, J., 2: 98	shift to market socialism in, 1:212
Valley of Death, 1:39	state intervention in, 1:214, 218
Value (worth)	in WTO, 1: 217
adding, 2: 243	Vigoda-Gadot, Eran, 2:212
co-opetition and creation of, 1:394–395	Village culture, 2:252–253
creating, 2: 402	Vinson & Elkins, 1:108

Violence	Watanbe, S., 2: 67
and emotions, 2:266	Waterman, R. H., Jr., 2:125
and organizational misbehavior, 2:224	Watkins, D., 1: 52
in workplace, 2: 266	Watkins, J., 1:52
Virtanen, P., 2:98	Watkins, Sherron, 1:108
Virtual consultant, 2:19	Wealth of Nations (Smith), 1:88
Virtual environments, 2:17	Weapons of mass destruction (WMD) incidents, hospital
Virtual leadership, 2:281	planning for. See Hospital planning for weapons of
Virtual office, 1:452	mass destruction incidents
Virtual Office Company, 1:457	Webb, James, 1:89
Virtual Reality Markup Language, 2:21	Web-based customer knowledge, 2:18–22
Virtual teams, 2: 34, 353	framework for, 2:18
Virtual work. See Mobile and virtual work	for idea generation, 2:18–19
Virtual work teams, 2:9–11	for idea selection, 2:19
and emotion recognition dilemma, 2:10-11	and product design, 2:19–21
and information asymmetry dilemma, 2:11	and product launch, 2:21-22
and self-interest dilemma, 2:10	and product testing, 2:21
Viruses, 1: 502, 504, 505, 2: 373	research for, 2:22
Vision	Weber, Max, 1:151, 152
and goals, 2: 209–210	WebMD.com, 2: 18
in young SMEs, 1:77	Web monitoring, 2:381
Visionary strategy conception, 1:77	Web sites, multilingual issues with. See Multilingual is-
Vision statements, environmental concerns in, 1:277	sues in global e-commerce Web sites
VisualSoftTechnologies, 2:8	Web technology, and IIOS, 1:319
"Vocational personality theory," 2:112–113	Web use at work. See Personal Web use monitoring
Vogel, D., 1:131	Weick, K., 2:473, 474, 476, 477
Volition, 2:206–207	Weinberg, B. D., 2:21
Volpe, Joseph, 2:487	Weingart, L. R., 2:44, 51, 52
Voluntarism, 1:168	Weiss, Howard, 2:260, 261
Voluntary environmental programs (VEPs), 1:272	Weitz, B. A., 2: 60
Volunteers	Wellington Fund Managers, 1:459
and arts management, 2:484–485	Wellness programs. See Employee wellness programs
in arts organizations, 2:488–489	Wenger, E., 2:16
Volvo, 2:19	Wernerfelt, B., 1: 327–328, 2: 36
Von Hippel, E., 2: 20	West, J., 1: 310
Vulnerabilities, identification of, 1:506	Westerbeek, H., 2:508
	Western Europe, 2:93
Wagner, Bryan, 2:387	Westfield America, 1:202
Wagner, Cynthia, 1:114	Westfield Holdings, 1:202
Wakabayashi, M., 2:241	Westin, Alan, 2: 385
Wall, T. D., 2: 58	West Nile virus, 2:495
Walls, and office design, 1:454	Wet work, 2: 429
Wall Street Journal, 2:24	Wheeler, H. N., 2: 59, 61
Wal-Mart, 2: 412	Whirlpool, 1:233
and business imitation, 1: 401	Whistle-blowing
and India, 1: 197	as organizational misbehavior, 2:225
and poverty, 1: 98, 104	as political tactic, 2: 214
RFIDs used by, 1:437	White-collar jobs, 2: 135
and supply-chain management, 1:412	White-collar work, 1: 453
supply-chain management at, 1:409	"White male model," 2:131
Walsh, J. P., 2: 462	Whole-brain thinking, 2:455
Walther, J. B., 2: 283	Whyte, W. H., 2: 66, 121, 259
Wanous, J. P., 2: 116	Wide area networks (WANs), 1:505
Warehousing, 1:288	Wilber, Ken, 2: 316–319
Warner, J. M., 2: 118	Wilkamson, P., 2: 240
Washington, D.C., schools in, 2:30	Williams, K. Y., 2: 38
Waste Electrical and Electronic Equipment (WEEE), 1:289	Williamson, O. E., 1: 325, 2: 36, 101
Waste management, and ethical manufacturing, 1:466	Willingness, 1:338

Wilson, Woodrow, 1:91	and personnel selection, 1:160
Winner-takes-all, 1: 304, 403	and productivity, 1:164
Win-win solutions, 1:253–254	and role models, 1: 160–161
Wireless technology, 2:350, 351	and self-confidence, 1:158
Withdrawal, from workaholism, 1:150	societal factors affecting, 1:162–163
Withdrawal behavior, 2:186, 224	and talent pool diversity, 1:164
Witt, Laurence, 2:217	Women-owned businesses, undercapitalization of, 1:56
Wolpin, J., 2:486	Women's careers, 2:113
Wolters, Teun, 1:117	Women's movement, 2:141
Women, 2:170. See also Minority-/women-owned busi-	Wood, S. J., 2:5 8
ness enterprise	Work
advancement of, 2: 147–148	changing nature of, 2: 131–132
and diversity management, 2:147–148	and family, 2: 171–173
incorporation into workforce, 2:76–77	open systems view for, 2: 171–173
in management, 2: 147–148	Work Addiction Risk Test (WART), 1:149
traditional role of, 1:55	Work adjustment theory, 2:112
and workaholism, 1:152	Workaholics, 1: 148, 149
Women Don't Ask (Babcock and Laschever), 1:159	Workaholism, 1: 148–155, 2: 357
Women entrepreneurs, 1:51–58	addiction focus of, 1:149–151
barriers/challenges facing, 1:55–57	and American work ethic, 1:151–152
business case for, 1:51–52	in current business environment, 1:152–153
characteristics of, 1:53–55	and denial, 1: 149–150
confidence of, 1:5 4	and identity/self-esteem, 1:149
defining, 1: 52	as organizational misbehavior, 2:224
education of, 1:5 4	as progressive condition, 1:149
and financial access, 1:56	research perspectives on, 1:148–149
in foreign countries, 1:52–53	responsibility for, 1:154–155
future research, directions for, 1: 57–58	and rigid thinking, 1: 149
growth aspirations of, 1: 56–57	and technology, 1:153–154
motivations of, 1:54	and teleworking, 2:368
and networking, 1:55–56	and withdrawal, 1:150
policy/support for, 1:57	Work environment, 2:113
risk orientation of, 1:54–55	Worker Adjustment and Retraining Notification Act of
and traditional roles, 1:55	1988, 2: 60
and undercapitalization of women-owned businesses,	Workers
1:56	changing nature of, 2:131–132
work experience of, 1:54	older. See Older workers
Women managers' success, 1:157–166	Workers, and flexible labor, 2:93–95
and asserting self-interests, 1:159	and external functional flexibility, 2:99–100
business case for, 1: 163–164	and external numerical flexibility, 2:97–99
and career planning, 1:159	and internal functional flexibility, 2:95–96
and corporate image, 1:164	and internal numerical flexibility, 2: 94–95
and creative potential, 1:164	Work ethic, 1:151–152
and customers, 1:164 and family, 1:163	Work experience
· · · · · · · · · · · · · · · · · · ·	and intrinsic motivation, 2:198–199
future research, directions for, 1:165	in public sector, 2: 198–199
and gender-role stereotypes, 1: 162–163 and human capital, 1: 158	of women entrepreneurs, 1: 54 Work-family balance, 2: 133
individual-level factors affecting, 1:158–160	and mid- and late careers, 2:133
interventions to increase, 1:164–165	and women managers, 1:163
and leadership style, 1:159–160	Work/family border theory, 2:80
and linguistic style, 1:159–160	Work-family conflict (WFC), 2:79
and management education, 1:163 and mentors, 1:161	Workforce, changing nature of, 2:131–132 Work-home interaction (WHI), 2:76–84
and networks, 1:161	classic theories of, 2:79
and number of women in organization, 1:162	congruence model, 2:80
organizational factors affecting, 1:160–162	consequences of, 2:77–78
and personality, 1:158–159	conservation of resources theory (COR), 2:80
mis personally, 1100 107	conservation of resources theory (COIL), 2.00

demand resource model, 2:80	and self-interest dilemma, 2:5-6, 8
development of, 2:76–77	types of, 2:3
and dual-earner couples, 2:76–77	virtual, 2: 9–11
ecological systems theory, 2:80	Work values, and culture, 1:379
employee strategies for, 2:81–82	Work vs. family balance, 2:127
and female incorporation into workforce, 2: 76–77	World Bank
fit model, 2: 80	and entrepreneurship, 1:45, 49
and human resources management, 2:78–84	and poverty, 1: 97
organizational strategies for, 2:82–84	World Business Council for Sustainable Development
perspectives on, 2:80	(WBCSD), 1: 255
related concepts, 2:77–78	World Commission on Environment and Development
and role hypothesis, 2:79–80	(WCED), 1: 116, 251, 465
strategies for, 2:81–83	World Conservation Strategy, 1:251
theories of, 2: 78–80	"World Development Corporation," 1: 102
variables related to, 2:81	World Economic Forum, 1:378
work/family border theory, 2:80	World Global Forum, 1:135
Working hours, and office design, 1: 454	The World is Flat (Thomas Friedman), 2:332
Working poor, 1: 95–98, 96	World Social Forum, 1:135
Working time, and flexible labor, 2: 94–95	World Trade Center
Work-life balance, 2:356–357	and organizational crisis management, 1:107, 113
Work motivation, 2:160–161	and terrorism, 1:202
Work motivation, and aging, 2:160–168	World Trade Organization (WTO)
and adult development, 2:162–166	and activist groups, 1:134, 135
future research on, directions for, 2: 167–168	Doha Round, 1:190
and maturation, 2: 162–163	and high technology entrepreneurship, 1:36
and recruitment, 2:166	and outsourcing, 1:444
social cohort influences on, 2:162	World War II, 1: 484, 2: 412
and successful adaptation, 2:166–167	World Wide Web Consortium (W3C), 1:341, 436
Workplace, emotion in, 2:266	Worrall, L., 2: 67
Workplace injuries, and teleworking, 2:366	Wright, A. C., 1: 317
Workplace toxins, 2:382	Wright, Frank Lloyd, 1: 452, 453
Work roles, in global projects, 1: 483	Wright, P. M., 2:87
Workscape, 2: 355	Writing, and intercultural adaptation, 2:254
Work schedules, 2: 173–175	Wurster, T., 2: 16, 17
compressed workweeks, 2:173–174	
in family-friendly organizations, 2:173–175	Xerox Corporation, 1:274, 357, 2:57, 344
flexible scheduling (flextime), 2:173–174	XML, 2: 344
job sharing, 2: 174–175	"X-teams," 2: 39
part-time employment, 2: 174	Xu, S. X., 1: 314
Work space design. See Office design	
Workstations, and organizational security, 1:504, 505	Yagil, D., 2: 49
Work teams, 2:2–11. See also specific types, e.g.: Transna-	Yahoo!, 1: 108, 2: 392
tional teams, in knowledge-intensive organizations	Yale University, 2:446
challenges for, 2:5	Yellen, J. L., 2:88
conflict management in. See Conflict management, in	Young Turks, 2:214
work teams	Yo-yos, 2: 352
defining, 2: 3–4	Yukl, G., 2: 485
dilemmas concerning, 2:5–7	Yunus, Mohammed, 1:100
and dispute management, 2:50–53	
and diversity, 2:45–46	Zajac, E. J., 1:325
effectiveness of, 2:3–4	Zan, L., 2: 483, 484
and emotion recognition dilemma, 2:6, 8-9	Zander, U., 2: 36
future challenges for, 2:5	Zelno, J. A., 2:48, 49, 51
geographical arrangement of, 2:46	Zero-sum thinking, 2:213
and globalization, 2:8–9	Zetsche, Dieter, 1:383
history of, 2: 4–5	Zhu, K., 1:314
and information asymmetry dilemma, 2:6-7, 9	Zsidisin, George A., 1:119
and interest asymmetry dilemma, 2:7, 9	Zuckerman, E. W., 2:38